

A description of the human urinary bladder, and parts belonging to it, with anatomical figures shewing its make, situation, etc. : to which are added, animadversions on lithontriptic medicines, particularly those of Mrs. Stephens, and an account of the dissections of some bodies of persons who died after the use of them / by James Parsons.

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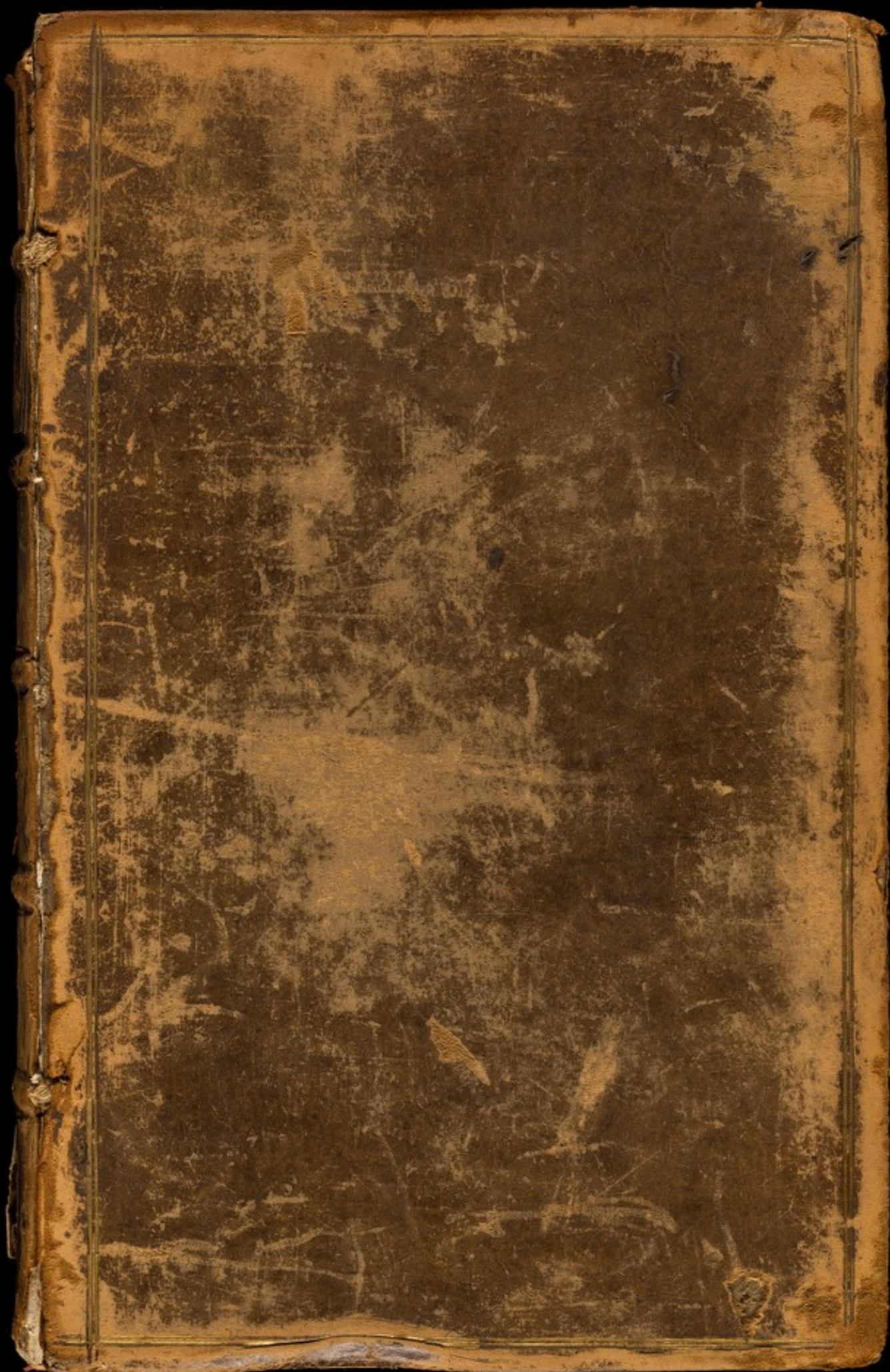
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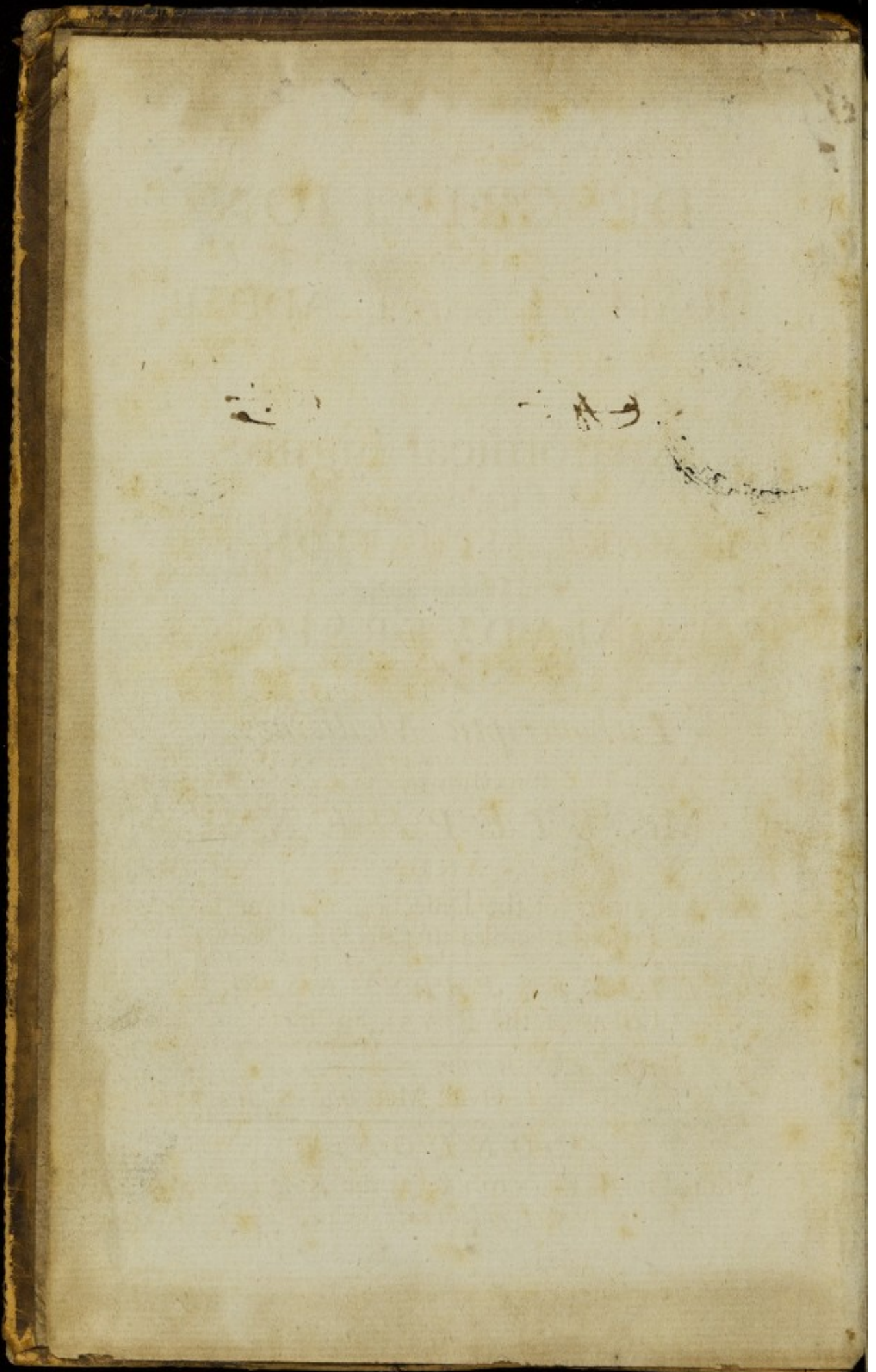
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Priffin St. Edmund Hall Oxon. Nov. 1770

of



Presented by Dr. Howel

By Inspector Genl. of Hospitals

21th June DESCRIPTION 1755

OF THE
HUMAN Urinary BLADDER,

And PARTS belonging to it.

WITH
Anatomical Figures

SHEWING

Its MAKE, SITUATION, &c.

To which are added,

ANIMADVERSIONS

ON

Lithontriptic Medicines,

Particularly those of

Mrs. STEPHENS;

AND

An ACCOUNT of the Dissections of some Bodies
of Persons who died after the Use of them.

By JAMES PARSONS, M. D.
Fellow of the ROYAL SOCIETY.

Tempus edax Rerum. ———

Ovid. Met. lib. 18. lin. 234.

L O N D O N :

Printed for J. BRINDLEY, at the King's Arms in
New Bond-street, 1742.

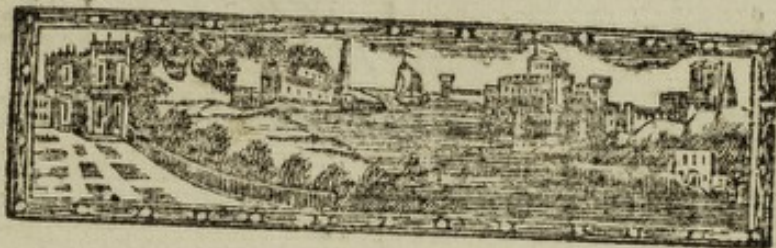
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DR. RICHARD MERRILL
FELLOW OF THE COLLEGE OF PHYSICIANS
AND OF THE ROYAL SOCIETY OF
LONDON

ANATOMICAL MUSEUM
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TO
Dr. RICHARD MEAD,

PHYSICIAN to the KING,

FELLOW of the COLLEGE OF PHYSICIANS,
and of the ROYAL SOCIETY of
LONDON.

S I R,

 F the Desire of arriving
at the Truth, in our Stu-
dies and Researches, can
have any Weight, in qualifying
a 2 one

one to claim the Protection of such as are truly Great, I may hope for Permission to address this little Book to you.

As one whose Number of Improvements the Medicinal Art is adorned with in every Branch, and of which the World every Day feels the good Effects, you command my Offer of the first Part; and of the rest, as one whose every Action terminates in some Benefit to your Fellow-Creatures, to whom the Welfare of Mankind is no indifferent Thing, and whose Dislike to whatever might prove detrimental to any, is not to be doubted.

I own

I own it is an ambitious Claim,
 I take the Liberty of laying to
 your Approbation; but, I hope,
 I am no less excusable than the
 Numbers that have, heretofore,
 been as covetous of that Honour
 as I am at present: And tho' the
 Performance may not have a Right
 to sue for it, yet the Intention
 of producing something useful,
 cannot want that Sanction from
 you, which must render it the
 more acceptable to every one
 else. I am, SIR,

Your most Obedient,

and most Oblig'd

Humble Servant,

James Parsons,



THE
PREFACE.



WHEN I had inform'd the late learned Doctor Douglas that I intended publishing the following Description of the Bladder (which was what I deliver'd concerning that Organ, in my Lecture upon the feminine Parts of Generation) together with the Animadversions on Mrs. Stephens's Medicines; he was so kind as to promise me an additional Observation of his own, and his curious Preparation of the Bladder to draw the Detrusor Muscle from
it,

it, which he then shewed me (as I have said in the Description) and accordingly appointed my going to him on the Saturday following for that Purpose; but when I waited on him, he was so very ill that he could not stay with me, and dyed the Thursday following, whereby I lost the Observation he promised, and was disappointed of his Preparation; and was therefore oblig'd to prepare one for that Purpose for myself; the other Figures being drawn from my own Preparations, by which I always demonstrated in my Course of Lectures.

*I am the more particular in this Narration, because I find it is industriously reported that what I publish concerning the Bladder is not my own. This was a Bolt soon shot, and at Random too; for my Manuscript was never seen by any one, till I had laid it before the great Man, who does me the Honour to patronize it. And therefore an Attempt to take away my Right to this Treatise (how-
ever*

ever imperfect it may be) is very ungenerous.

I am far from omitting to make Honourable Mention of every Author's Name from whom I take a Quotation or Opinion that serves to illustrate any Essay of mine; and it appears in this, I have not. And as Doctor Douglas was the first that made a Preparation to demonstrate the Shape of the Detrusor Urinae, (which was all he assumed to himself; the Existence, Use, Synomina, &c. of that Muscle, being known to most Authors before) I have not fail'd to quote him for his Opinion of it, (tho' he had wrote nothing concerning it that I know of) join'd to that of Mr. Winslow, with the utmost Respect: And as the Addition he intended, would have augmented the Usefulness of this Treatise, the Loss is much to be regretted; yet I hope what I have said of the Bladder, &c. will appear of some use, as it is the Effect of my own repeated Examinations of the Parts I treat of, and

not the Property of any other Person whatsoever. I must further add, that the only Conversation we ever had together concerning the Bladder (besides what I have mentioned) was upon that of Mr. Gardiner, which was prepared by the ingenious Mr. Nourse, and by him sent to Dr. Douglas for that Purpose, with his Request that I should make a Drawing from it.

As to Mrs. Stephens's Medicines, what is said of them is not from the least personal Prejudice to her, nor any other; but as Dr. Hartley once thought he had sufficient Reason to recommend them to the World, and as all that has been wrote hitherto concerning them, was on their Behalf; it is now high Time to say something on Behalf of the Publick, who are so deeply concerned in the Affair, since many strong Evidences now appear against any Power in them of dissolving Stones in the Kidneys, or Bladder.

To give the Cases alone, as they occurred all along in the View of the Present Evidence, and refer them to the Publick, would be extreamly fair; but to excuse their want of Efficacy, and argue for them in several other Respects, was to anticipate the Opinion and Judgment of the World concerning them, and seems to savour a little of Prejudice. And therefore, as the Author of that Book has given his Sense of the Cases in so free a Manner, I think every one has the same Right to consider them, especially as they were published by way of Evidence both for and against the Medicines. It is therefore that I have laid down both the Cases and his Sense of them in his own Words, but particularly of those in whose Bladders Stones have been found after Death, and consider'd them in a Light that I hope will appear Rational to all who have a Regard to the general Good of Mankind.

All

All Men are sometimes liable to adhere to a favourable Opinion of Persons or Things; but it is very commendable to yield to plain Conviction, when what is contrary to our former Sentiments appears; because both may be done with a View of serving the World. And if it had been my Fate to have set out with a firm Belief of the certain Efficacy of these Medicines; such Proofs as now turn up would surely induce me to own my Mistake, rather than persist in defending them, notwithstanding what has happened, to confront the good Opinion of them I might have formed before.

The Reader, it is hoped, will excuse the Repetition of some Things, both in our Animadversions and Remarks of the Cases; which are so very often, and upon so many different Occasions, mentioned in the View of the Present Evidence, that we could not avoid obviating them as often as we met them.

CON-



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A
DESCRIPTION
OF THE
HUMAN Urinary BLADDER,
WITH

Anatomical Figures,

SHEWING
Its MAKE, SITUATION, &c.

Of the Bladder.



SINCE it was necessary for *Proemium.*
the Welfare of the Body,
that an Excrementitious
Fluid should be secreted by
the Kidneys from the Mass of Blood,
and thence discharged by the Ureters, it
was highly necessary there should be a
B Reservoir,

Of the Bladder.

Reservoir, or Cistern, to receive it, and thereby gain, for the Animal, considerable Intervals for the Performance of other necessary Functions. For if there was no such Reservoir, but that, instead thereof, the Ureters were inserted into the Urethra, there would be a perpetual Dripping of the Urine, as the Secretion is perpetually made, to the great Inconvenience of the Animal.

*Convenience of
the Bladder.*

Provident Nature, therefore, having furnished Animal Bodies with this Organ, has not fail'd of forming it in the most commodious and useful Manner; altho', if we take Notice of its Description from many Authors, we might have some Right to doubt of its being so very useful, as we shall prove it is.

Definition.

This Receptacle, then, is a membranous Sack of a flexile Nature, being capable of Dilatation and Contraction, according to the Necessity of retaining and expelling its Contents.

Its

Its Membranes, or Coats, are three; Inner Membrane. the Internal, which is very nervous and sensible, in order to be capable of Irritation, is the most delicate and thin, and furnish'd with innumerable Glands, for the Secretion of the Juice which lines the Bladder, or guards it from the too great Acrimony of the Urine; for if Diseases of the Mucus. this Membrane by any Accident, as the taking of acrimonious, abrading Medicines, or by a thin, sharp, hecatical Blood, which wears away the Mucus, should be laid bare, we should be liable to suffer an exquisite Pain; and tho' it is thus guarded by the Mucus, yet its Sensation is not quite blunted, that Matter serving also as a Medium thro' which it is capable of being sufficiently irritated without Pain, as the Cuticula is the *Medium*, thro' which we feel (without Pain) any Object we touch. But if this *Mucus* should, on the other Hand, become too much condensed (which is the Case in those that have a Lymph loaded with coagulating Salts) it would become hard,

Of the Bladder.

and as it were encrusted, and would obstruct the Glands.

*Cause of a
Schirrous Blad-
der.*

From such an Obstruction there might proceed an Induration of some of the Glands, which when once begun, the gradual Encrease of a schirrous Bladder is inevitable, from the constant Pressure, and Induration of other Glands, by those first obstructed. Over great and long Exercises will cause this Siccidity of the Mucus of the Bladder; for thereby Perspiration is so increased, that the more fluid Particles, which should dilute that Matter in the secretory Glands of the Bladder, are thrown off thro' the Pores of the Cutis, and the *Mucus* left in a very viscid State, whereby it is as capable of further Coagulation and Induration, as the White of an Egg.

Use of the Villi

This Coat is faced all over its Surface with a villous Appearance as the Gut Ileon is; the use of which I take to be, that they may serve as so many soft *Ramuli* to entangle the *Mucus*,
that

Of the Bladder.

lent Matter of an Ulcer in some of the Urinary Organs; or for some Weakness in the prostrate Gland, Vesiculæ Seminales, or the like, whereby we might be deceived, and prescribe what might encrease the Evil. † *Riverius* calls it a depraved Disposition of the Bladder, and teaches us how to distinguish it so as to be certain whence it comes: he says, ' That the Matter coming from the ' Bladder is different from that of any ' other Place, in this, that it is more ' Tenacious and Glutinous, and will ' stick to the Sides of the Urinal after- ' the Urine is pour'd off, and after, ' wards can scarce be separated from ' the Vessel. Whereas the Mucus ' from any other Parts does not adhere ' to the Vessel, but comes off with the Urine'. This, he boasts of as his Discovery, and is indeed a Diagnostick that may be often useful.

*Plicæ of the
inner Coat.*

This inner or nervous Coat is much larger and more extensive than any of its

† *Praxeos Medic. Lib. XIV. c. 2. de Calc. ves.*

its Coverings; and therefore, when they are contracted, this appears in the Plicæ, having no Elasticity whereby to contract; and even after the outer Integuments are much dilated, there will Rugæ still appear in this.

This is of wonderful Use: For supposing that by any Accident the Urine was detained in the Bladder longer than ordinary, so that the external Integuments were upon the Stretch, it was highly necessary that the nervous Coat, being so sensible of Pain, should still have some Plicæ to spare, that there might be more time to promote the Discharge of Urine, by proper Applications; because if this Coat should be stretch'd as soon as the others, Convulsions would follow; for when soever it happens, that is the Consequence.

The Case of a young Woman of ^{Hymen im-}†Seventeen demonstrates this Effect; ^{perforatum.}

B 4

she

†This Case was read before the Royal Society, as it was communicated by me who attended the young Woman,

ſhe had the *Hymen imperforatum*, and ſeveral periodical *Menſtrual* Diſcharges were lodged in the *Vagina*, till at length the Bulk was ſo great as to preſs the *Urethra* againſt the *Os Pubis*; and thereby cauſe a total Suppreſſion of *Urine*. Her *Belly* ſwelled by the Increate of *Urine* from the *Kidneys*, and yet ſhe ſuffered no more Uneaſineſs than an Irritation to make *Water*; tho' from the Bulk of her *Belly*, thoſe ignorant Perſons who attended her, thought her with *Child*; till the 5th, or 6th Day from the total Suppreſſion, when ſhe was thrown into the moſt violent *Con-
vulſions* I ever ſaw, which ceaſed as ſoon as her *Water* was drawn off by the *Catheter*: and after the *Hymen* was open'd, and the great Quantity of *Blood* diſcharged that filled the *Vagina*, ſhe urin'd freely, and had no return of any *Symptoms* whatſoever; this ſeems to be the uſe of theſe *Plicæ*.

Woman, and ſhall be publiſhed among ſome *Miſcel-
lanies*, when a ſufficient Quantity of *Caſes* happen.

From these Rugæ we may also account for the Receptacles that Stones find sometimes in the Bladder. Where a tenacious *Mucus* abounds, and a Stone, or more, happens to be stuck in between two *Plicæ*, they are glued to the Stone, and a slight Inflammation happens, which causes the Villi of that Coat to shoot out and extend themselves over the Stone, while the *Mucus* itself grows still more tenacious, and has often the Appearance of a Membrane. This made *Tulpius* say, that two Stones voided by a Woman, had Membranes around them, which was nothing but *Mucus* condensed and dry'd about them, for which I have quoted him in another Place.

Thus may Stones acquire membranous Productions round them in the Bladder, and thereby become inseparable from it; and when these Villi do not shoot out to cover them, yet they may have Mucous Coverings which dry into a kind of Membrane, either adhering

hering to, or separate from the Bladder. When the Bladder is taken out of the Body and inflated, then the Rugæ of the internal Coat disappear; because when the muscular Coat is then distended so much as to obliterate the Plicæ in the nervous Coat, it has no more Power to contract itself as before, and consequently when the Air is again press'd out, all the Coats and Muscles collapse together. The same will be the Case in those, who being subject to the Stone, with very frequent Stoppages of Urine, have the Bladder often distended by Repletion, and its Tone weaken'd by the long Use of irritating acrimonious Medicines; and there can be no greater Sign of Injuries having been done to the Bladder, than (upon taking it out of the Body without inflating) finding it's whole Compages relax'd, and cutting into it, finding the Rugæ obliterated.

Muscular Coat. The next is the Muscular Coat, which, according to the received Opinion, consists of longitudinal Fibres, which

Of the Bladder.

which are called the Detrusor Urinæ; and others of different Directions on the Sides, together with the Sphincter.

Mr. *Winslow* says, * 'The Muscular Coat of the Bladder is composed of several Layers or Strata of fleshy Fibres, the *external* of which are for the most part Longitudinal, the next are more inclined to the Sides, and the *internal* ones are more and more Oblique, till at length they become almost Transversal.' This Description, join'd to the Opinion of that accurate Anatomist Dr. *Douglas*, with whom I had the Pleasure of examining a Preparation of his, not long before his Death, would induce one to believe, that the Detrusor Urinæ, which is what Mr. *Winslow* calls the *external longitudinal Fibres*, lay upon the other muscular Fibres ;

* La Tunique Musculeuse est composée de plusieurs couches de Fibres charnuës, dont les *externes* sont pour la plupart longitudinales, les suivantes plus inclinées de côté et d'autre, les *internes* de plus en plus obliques, et enfin presque transversales.

Expos. Anatom. p. 556. N°. 451.

bres; and consequently, that what it covers may probably be the muscular Coat, exclusive of that or the Sphincter of the Bladder; for in that Preparation, and in several Bladders I have since prepared, according to the nicest Observations I could make, the oblique and transverse Fibres that cover the Sides within the Arch of the Detrusor, seem'd to run from under that Muscle; which is very plain in good muscular Bodies, whose Bladders are well macerated at different Times in warm Water.

One might also imagine the same, from an Examination of the Offices of the Muscles of the Bladder, and of what such a muscular Coat ought to perform, if this is the Structure of that Organ; for the two Muscles, the *Detrusor* and *Sphincter*, have separate Offices to perform, the one to retain, and the other to extrude the Urine, and those Actions are perform'd alternately; whereas the Office that might be expected from such a muscular Membrane, should be only, (1.) Upon the Expulsion of the
Urine

Urine by the *Detrusor*, to follow it, by contracting itself equally, and pressing upon the nervous Coat all round, that there might not be a Collapsion of the Bladder, but that it may lie tight and compact, and preserve this Equality, till it is again gradually dilated by the Ingress of the Urine from the Kidneys. And, (2.) To cause the Distension to be equally carried on as it fills. We shall not, however, pretend to be positive in this, but refer it to the more accurate Inspection of others; yet we shall offer the Reader one Observation more, which seems to shew that there was a Necessity for Muscles exclusive of a proper muscular Coat in the Bladder; which is, The Intestines have pretty much the same Structure with this Organ, as to its Coats, *viz.* a Nervous, a Muscular, and a Covering from the Peritonæum: Now, tho' there is no Necessity in these for a Muscle Analogous to a *Detrusor*, because they are cylindrical, and grow wider as they descend, and the Excrements by their own Gravity, assisted by a gentle peristaltic

staltic Motion, will be sufficiently protruded: Yet we see, where it is requisite the Excrements should be retain'd, there is a Sphincter besides the proper muscular Coat to perform that Office. And besides, as the Urethra is so narrow a Passage in either Sex, in Comparison to the rest of the Bladder, an additional Force, for the Expulsion of the Urine in a full Stream, was highly necessary; otherwise the Urine would be discharged by Drops, to the great Inconvenience of the Animal.

The two Muscles of the Bladder shall be describ'd hereafter.

Peritonæum.

The *External Integument* of the Bladder is a Part of the Peritonæum, which covers its posteriour Convexity, Top and Sides, having no fatty Particles under it; but on the fore Part it is covered with a cellular Portion, in some very full of Fat, the under Lamina of which lies close upon the Muscle *Detrusor* and muscular Coat. The Duplication of this Covering, when held up,

up, may be accounted a flat Ligament, by which the Bladder seems to be greatly sustained in both Sexes, as having an Edge all round the Top and Sides, which makes its Support bear an Equality every where, to keep it in its Place ; otherwise it would be pull'd but in the one Point at Top by the Urachus, and by the Arterial Ligaments, which all terminate in the Cicatrix of the Navel.

From this Consideration we may find the Cause of what some call a Cramp in their Navels. This Pain proceeds from a Vellication of those Ligaments, by any thing capable of pressing the Top of the Bladder downwards, or by a strong Contraction of the *Musculi Recti* of the Belly, to which that Part of the Peritonæum, wherein these Ligaments are carried to the Navel, adheres. And in Women it is often a Complaint, as they grow big with Child, because the Ligaments pull the Navel by the Distension of the Peritonæum and Muscles of the Belly downwards, from the Increase of the

Pain in the Navel.

Uterus. These painful Sensations of the Navel are easily taken off by one or two emollient Anodyne Fomentations.

This Observation I have no where met among Authors, nor the following, which relates only to Women; and which is the only true Way of accounting for the Time and Manner of these two Inconveniences in pregnant Women, the inordinate Retention and Incontinence of Urine.

But it will be necessary to premise the proper Situation of the Bladder, that this Observation may be the better understood.

Situation.

The Bladder is placed against the *Ossa Pubis*, its middle Part being right upon the Symphysis of these Bones; and the *Urethra* falling into the Arch under them; so that when it is empty, its upper Part hardly reaches up higher than the upper Edge of these Bones; and when full and inflated, it

rises

rises over it. In Men it rests upon the Rectum at its Curvature †, and leans back upon that Gut as it grows perpendicular; so that this Bend necessarily humouring the concave Side of the *Os sacrum*, seems very conveniently calculated as a Bed or Nest for the Bladder to rest in. In Women, about three Inches of its Fundus lies upon the Vagina, the longitudinal Fibres of this Part lying under and parallel to the Detrusor Urinæ. It quits the Vagina about the Beginning of the Cervix Uteri, a little over the *Os Tinca*, and is then covered in common with the Uterus by the Peritonæum, on its back Part, both being void of any Fat, or cellular Membrane. Here we see there was no Necessity for any; because the Uterus, when full, or pregnant,

C

nant,

† Persons administering Clysters being ignorant of this Direction of the Rectum, are apt to thrust the Canula against its inner Coat, just above the *Sphincter*, and wound the Intestine, which is sometimes attended with bad Effects. I have seen several *Fistulas* cut in the *Hôtel de Dieu* at *Paris*, proceeding from that Error.

nant, is not hard enough to injure it; and when empty and low in the Pelvis, it is safe also by the Softness of the Intestines: Whereas before, it was necessary that there should be a Portion of the cellular Membrane, well impregnated with Fat to sustain the Pressure against the Bone, and accordingly we see it is the Order of Nature that it should be so.

This being the Situation of the Bladder, and it being covered with the same Membrane with the Uterus, the manner of the Suppression of Urine, which is the first that happens in Pregnancy, of these two Disorders of the Bladder, may be thus accounted for.

Cause of Suppression and Incontinence of Urine.

As the Uterus in its empty contracted State lies deep in the Pelvis, and as the Bladder lies over it, especially in the Time of its Repletion with Urine, the first Pressure made by the *Uterus*, when it begins to swell and grow round, is on the lower Part of the Bladder, and Urethra: This Pressure is made diametrically

metrically against the *Ossa Pubis*, whereby the Passage being stopp'd up, the Urine cannot be discharged but with great Difficulty ; and sometimes, the Bladder being much distended, the Urine is to be drawn off by the Catheter : hence with me this is one Sign of either Pregnancy, or a schirrous Uterus.

But as the Uterus grows upwards, and begins to rise above the * *Cingulum* of the *Pelvis*, the Bladder gradually decreases in its Bulk, and consequently then rises not so high, nor cannot be filled so full of Urine as before ; because the swelling Uterus by degrees stretches the *Peritonæum*, as it were, dragging it away from the Bladder ; in-somuch, that as the Uterus increases in Bulk, the Bladder decreases, and never recovers its former Capacity till after the Delivery of the Woman. Wherefore towards the latter Months the Pres-

C 2

sure

* The *Cingulum* of the *Pelvis*, is that Ridge on the upper Edge of the *Ossa Pubis*, which running round the *Ossa Iliæ*, forms one intire Ridge with the upper Part of the *Os Sacrum*.

sure is taken off from the Sphincter and Urethra, and is wholly against the upper Region of the Bladder, whereby the Urine is daily press'd out as fast as it comes in. I have opened several Women who have dyed in different Months of Pregnancy, and many whose Uteri were empty, in order to be sure of this Observation, and always found that by how much the Uterus was enlarged, the Bladder was lessen'd in proportion; which I demonstrated in my Lectures by inflating the Bladders in both States. From these Observations we may see the true Cause and Time of these Disorders, and may therefore be the better able to alleviate the Pain poor Women suffer at these Times.

Of danger, in Partu, of bursting.

Another Observation worthy of Note here is, that at the Time of Labour, when the Child's Head presses forward, if there happens to be any considerable Quantity of Urine in the Bladder, it is capable of retarding the advance of the Child, and increases the Woman's Pain greatly, by pressing the Bladder so
forci-

forcibly as to cause Inflammation, and a tedious Difficulty of making Water afterwards. I was requested to open one who died an Hour after Delivery, and found the Bladder burst near the Urethra on the right Side. The Aperture was above an Inch long, and a great Quantity of Urine was extravasated into the Pelvis. From whence we see of what Consequence it is to know whether the Bladder be empty or full. If the Women present be ask'd when the Patient has made Water, they often say she has, mistaking the Water of the *Amnios* for Urine, which often runs off by Gluts or Intervals, and deceives them, when at the same Time the Bladder is ready to burst. The surest Way in this Case, is to draw off by the Catheter, which is easily perform'd, and then the Destruction of the Bladder is prevented, and the Labour facilitated.

We come next to the Muscles of the Bladder, which are two. The *Detrusor Urinæ* and the *Sphincter*.

History of the
Detrusor.

The former was so called by *Spigelius*, who acknowledges he had his first Knowledge of this Muscle from his Master *Hieronymus ab Aquapendente*, who with *Bartholinus* called it *Musculus involvens*, but **Spigelius* first gave it the Name *Detrusor*. Upon separating the Peritonæum and cellular Membrane, it appears very plain to lye upon the muscular Coat, and by Maceration becomes still more apparent. It arises narrow from the inner and lower Part of the *Ossa Pubis*, immediately under the *Symphysis*, and passing over the prostrate Gland on the anterior Side, runs up longitudinally, spreading as it approaches near the Top, round the *Urachus*, and grasping all that Part of the Bladder, grows narrow by Degrees as it passes on the posterior and inferior Part, and at length is inserted into the same Gland underneath.

† Primus autem Excellentissimus Hieronymus ab Aquapendente præceptor noster hunc usum tribuit, cuius auctoritatem nos sequentes, *Urinæ Detrusorem* appellabimus. *De humani Corp. Fabrica*, cap. 12.

If this Muscle was extended longitudinally, as in Plate 4. Fig. 1. it would appear like two Fans spread out, with their broader Parts laid together, which makes me call the narrow Parts the Handles of the *Detrusor*. Now since this is the Form of this Muscle, that is, narrow on the fore and back Parts, or Origination and Insertion, and spread over the upper Part, it must form an Arch over the Sides of the Bladder, and so leave that Part under the Arch weaker than in any other Place.

This weaker Part is more extensive in some Subjects than in others; or, in other Words, the Muscle is more expanded in some than in others, and consequently the Arch which it forms is less.

In Women this Muscle has the same Origination; but its Fibres are lost in the Sphincter on the under-side running along the Vagina. This is contrary to the Opinion of the learned Dr.

*Origin and
Insertion in
Women.*

Rutty *, who, in his *Gulstonian Lecture* on the Urinary Passages, says, the Fibres of this Muscle are inserted into the Vagina; but this would be an inconvenient Insertion, and would occasion a troublesome and painful Vellication in the Vagina, whenever a Woman made Water. He says, in the Beginning of the same Paragraph, ‘ It is not easy to apprehend, how the Contraction of this Muscle should produce such an Effect as it is commonly described; since its longitudinal Fibres, having no fixed Point whence they spring, but terminating at each End in the lower Orifice of the Bladder, they would rather pull up the Neck of it when they contract themselves, than bring the Fundus downwards.’ To this it may be replied, That since the Urethra is fixed by its proper Attachments in both Sexes below, there cannot be wanting a fix’d Point, towards which the Fibres of the Detrusor should contract themselves; and indeed they must inevitably do

* Page 12.

do so, having no other Let or Hindrance to resist it in the least, than what might be expected from the *Urachus*, and arterial Ligaments fastened to the Navel; and lest this should be thought a material Hindrance to their doing their proper Office, I must here observe, that Nature has provided against that, by placing the * *Pyramidal Muscles* over the Bladder, which, arising from the *Ossa Pubis* fleshy, and terminating by a narrow Tendon into the *Linea Alba* below the Navel, and sometimes reaching to it, draw down the Navel, and by that Means cause a Relaxation of the *Urachus* and *Arterial Ligaments*, when we are going to make Water; which then suffers the *Detrusor Urinæ* to contract with Freedom to expell the Urine.

Hence we may observe, that the *Pyramidal Muscles*, or in their Stead
the *Use of the Pyramidal Muscles.*

* Where these are wanting, the lower Parts of the *Musculi Recti* are much thicker, and are closer together, and can therefore, when they contract, pull down the Navel, and perform the same Office that the *Pyramidals* do.

the lower fleshy Bodies of the *Musculi Recti*, sometimes act as Antagonists to those Parts which sustain the Navel in its Place, which is only in making Water ; but in going to Stool the upper Parts of the *Musculi Recti* pull up the Navel, and consequently hinder the *Detrusor* from acting, which is the Reason that many People cannot make Water till after the *Fæces Alvi* are all discharged, for it is very rare that both are discharged together. That ingenious Anatomist Dr. *Nichols* has demonstrated this in a most elegant Manner ; for the Explanation of which he has a Figure in his third Plate, and explains it, as it is set down underneath. †

The

† Vesica urinaria quæ, mediantibus ligamentis tribus rotundis, umbilico adnectitur, ut in fæcibus expellendis (elevato simul & umbilico & vesica) liberior sit fæcibus transitus per rectum. Vis interior omnis, qua umbilicus in suo situ retinetur, longitudinalium vesicæ fibrarum contractionem prohibet, ideoque musculi pyramidalis actio requiritur, quæ in urinis expellendis umbilicum deorsum trahat : ut relaxatis inde ligamentis rotundis longitudinales vesicæ musculi se contrahant, & vesica undequaque coarctata, urinas per urethram effundat. *Comp. Anat.*

The Vicinity of the *Detrusor* Muscle In the Coitus
an Irritation. to the Vagina, as lying upon it for the Space of about three Inches, and the Direction of its Fibres being parallel to it, causes an Effect which is worth remarking; which is, that at the Time of Coition, if there be any considerable Quantity of Urine in the Woman's Bladder, the *Penis* pressing up the Vagina, and consequently the under part of the *Detrusor*, causes so great an Irritation to make Water, that it is often a great Impediment to a due Consummation of the Purposes for which the Coitus was ordained, in that Sex, and consequently some Impediment to Generation.

The other Muscle of the Bladder is the *Sphincter*, which consists of a Parcel of muscular Fibres encompassing the anterior Orifice of the Bladder at the going off of the Urethra. In Men they are almost hid by the Prostate Gland being behind it. In Women they are more conspicuous, lying over
I the

the Orifice of the Vagina, as in Plate 3. Fig. 1.

*Use of the
Muscles.*

The Use of this, is to keep that Orifice of the Bladder constantly close, to prevent a continual dribbling of the Urine while it is falling from the Kidneys. And the Use of the *Detrusor* is, (when the Quantity of Urine is increased, so as to press pretty much upon the Orifice of the Urethra, the Sphincter being irritated thereby) that that Muscle should grasp the Bladder, and squeeze out the Urine in a full Stream, after the Pyramidals have pulled down the Navel, as was before observed, to give it Liberty. This leads me to shew how the weaker Parts of the Bladder may be distended on either Side, and how Sacculi may be thrust out in particular Parts of it, as in Fig. 2. Plate 4.

*Manner of the
Formation of
the Sacks.*

When any Matter whatsoever stops up the Orifice of the Urethra in the Bladder, and it is filled with a sufficient Quantity of Urine to irritate the Muscle

to act for the Discharge of the Urine, the Contraction of the Muscle drives the Fluid towards the Orifice with great Force, which being resisted by whatever stops the Passage, its chief Propulsion will be against the weak Sides of the Bladder under the Arches form'd by the Muscle, whereby that Part will be thrust out, on both Sides, round and equal; and as often as this happens it will still enlarge these Parts more and more, till they suffer an irrecoverable Relaxation. At length if there be any one Spot, on either Side in the Places so weakened, whose Resistance may be less than that of any other, it will yield still more than the rest, and a Sacculus will be thrust out in that Place, and more especially if there be Stones in the Bladder, which may help forward the Protrusion by their Gravity, whenever they fall on the Part by any particular Situation of the Patient.

This, with what is said in the Case of Mr. *Gardiner* hereafter, will, I hope, be found a rational Account of the Protrusion

tion of those *Sacculi*; of which Effect that Gentleman was an unhappy Instance, as well as the famous Case of *Casaubon*, in whose Bladder the *Sacculus* was thrust out on one Side.

*Figure of the
Bladder.*

As to the Figure of the Bladder, it is most frequently compar'd to a Pear by Authors, or a Bottle with the Neck turn'd downwards; from whence they divided it into a Neck and Bottom, or *Fundus*; accordingly *De Graaf* has drawn it like a *Florence* Flask.

If this was the true Shape of the Bladder, there might be some Reason for this Division; but there is so little Appearance of a Neck, that, I must own I cannot subscribe to it.

The Bladders of some Brute Animals have a Narrowness, which made *Galen* and others after him since, say the same of human Bladders; but tho' such a Structure is not inconvenient in *Quadrupeds*, yet it would be exceedingly so in human Bodies; for in the latter,

ter, as they move in an erect Position, if there was a narrow Neck, one Thimble full of Water would irritate by its Gravity, as much as the Bladder full does in its present Form; and the Evil would be as great, as if there was no Bladder at all, but the Ureters terminating in the Urethra, the Desire of making Water would be so frequent. But the most capacious Part of the Bladder is downward, forming a large Sinus on each Side of the posterior Handle of the Detrusor Muscle, whereby the entire Pressure of the Urine is thrown both Ways, and bears very little on the Orifice, till the Bladder becomes pretty full, and the middle Column becomes more weighty: whereas in Brutes the Position of the Bladder is horizontal, and the Pressure of the Urine only against the lower Side of it.

I shall therefore divide the Bladder into the Top or upper Part, Sides, and *Fundus* or Bottom; for if there be any Apex to the Bladder, it appears most in Men, and is that Part from which
the

the *Urachus* springs. In Women the Bladder is more Spherical when inflated, its broadest Part, however, lying upon the Vagina; and therefore the Bottom of the Bladder is downward, tho' the Urethra passes out of it: It being no more improper to say the Urine flows from the Bottom of the Bladder, than that Water runs from the Bottom of a *Cistern* by the Cock. Thus it appears not only from the Office of this Organ, but also from its true Shape, that it was erroneously said to have a Neck, or that its Fundus was upwards; which is much to be admir'd at, since it is a part so easily taken out of the Body, and consider'd minutely.

Mr. *Winslow* is the only Author that had considered this Organ rightly, except the late learned Dr. *Rutty* mentioned above, who, tho' he gives no particular Account of its Form, yet expresses it in his Figures*. The former says, 'Its Figure is near an Oval shortened

* Gullstonian Lecture, Tab. III.

‘ ened, more large on the fore and hind-
 ‘ er Part, than on the Sides, rounder
 ‘ above than below when empty,
 ‘ and larger below than above when
 ‘ full.’ This is certainly true, and the
 Reason of its being rounder at Top than
 at Bottom when empty, is, that the
 Sphincter drawing its Orifice close, to-
 gether with the oblique Fibres of the
 muscular Coat, a good Way up, makes
 it narrow there; whereas the *Detrusor*,
 being contracted only according to the
 longitudinal Direction of its Fibres,
 draws down the Top without purring
 it up, but leaving it round and blunt†.

The Size of the Bladder is various, *Size.*
 being sometimes larger, sometimes
 smaller; and there are many very
 large Persons, who have Bladders of the
 smallest Size and Capacity, and some
 Children who have them as large, and
 often larger than Adults. This inti-
 mates to us, that they are calculated, in
 their Capacity, in proportion to the
 Quantity and Necessity of the Secretion
 D of

† *Exposition Anatomique*, p. 556. Num. 448. 4to.

of that excrementitious Fluid the Urine: However, this one Observation may lead us to know those whose Bladders can contain most, by their Infrequency in making Water; for they whose Bladders are small, must be subject to go oftener than on the contrary; because the Secretion being continually made in the Kidneys, they must be sooner fill'd, and consequently sooner irritated to a Discharge; unless some morbid Cause should render the smaller Bladder less sensible, or the larger sooner irritated.

Holes.

The Bladder has three Orifices, two which lead into it, and one which is its Outlet. The two former open into the posterior part of the Fundus of the Bladder, their Openings facing each other, and being of an oval Form while they are kept open by the Ingress of the Urine. They slant between the muscular and nervous Coats about half an Inch before they open into the Bladder, this *intermembranous* Passage being narrower much than the Ureters are before
I their

their Infertion. The Edges of these Holes are extremely thin, and seem to be a Duplicature of the inner Membrane of the Bladder and Ureters meeting. They serve as Valves to prevent the Egrefs or Reflux of the Urine by the Ureters; for as soon as the Urine is so far increased as to cover these Holes, it begins to press upon the Valves or Edges, which, being thin and flexile, are easily push'd against the other Side; and the greater the Quantity of Urine, the greater is the Pressure; so that towards the End of the Repletion of the Bladder, whatever Urine presses in, is, as it were, forced in, the Resistance being in Proportion to the Quantity of Urine contained, and to its Weight against the Edges of the Holes.

The other or third Orifice is that of the Urethra, and, in both Sexes, is situated on the Fore-part of the *Fundus Vesicæ*. In Men this Orifice is but narrow; in Women it opens much wider, and grows narrower, as does the whole Urethra, to its external Orifice, or *Meatus Urinarius*. The

Ligaments.

The Ligaments of the Bladder are four; one general, and three particular: The general one is the Peritonæum at its Duplication all round, which, as we have said before, is designed for a Support, as well as a Cloathing to this Organ. The three particular are the *Urachus*, and the two arterial Ligaments. The *Urachus* is an Elongation or Production of the inner Coats of the Bladder, becoming by Degrees hard and ligamentary after the Birth of the Child. The Arteries arise from the internal *Iliacs* or *Hypogastrics*, and, in the *Fœtus*, serve to convey the redundant Blood after its due Nutrition, constantly to the Placenta; but after the Birth, that Course being stopped, they begin to grow ligamentary from above downwards by Degrees, till they descend to the Sides of the Bladder, where they are tied by the Peritonæum, under which they remain still tubular, and bring a small Quantity of Blood to the Bladder, which is dispersed thro' little Ramifications on its Sides.

It is worth remarking, that the Iliacs, both internal and external, are not always in the same State, with regard to each other; for, in a *Fœtus*, the internal Iliacs are much larger than the external, having now a large Stream of Blood to send from the *Fœtus* by the umbilical Arteries, besides what was necessary to go to other Parts of the lower Extremities. Whereas, when a Child is grown up, there being no more Use of the umbilical Artery, and the Parts to which the External Iliacs lead, being more considerable than those to which the Internals are detached, they now become larger, and the Internals much less, even to appear as only small Ramifications to the others. I had my first Notion of this, from that excellent Anatomist Mr. *Winslow* †, in

D 3

some

† l'Interne est aussi appelée Hypogastrique, laquelle souvent ne paroît qu'une Branche de l'autre dans des Adultes, & après la Jeunesse; car dans les petits Enfants, et sur tous dans le Fœtus, l'Hypogastrique paroît le Tronc, et l'autre comme si c'en étoit une Branche.

Expos. Anatomique, des Arteres, N^o. 231.

some Discourse we had on that Subject; he has also hinted it in his Book, and I have often remark'd it since, in *Fætus's* and *Adults*.

Conclusion.

I have confined myself to the Description of the Bladder alone, the other Organs of Urine being already justly considered by several Authors; whereas this, in some Particulars, does not appear to have been rightly understood, especially among the Ancients: And among later Anatomists, very few have given any other than a general Account of it.

If I have so far succeeded, as to have given any Hints towards an additional Improvement to what was already known of the Bladder, it will give me great Pleasure. We here pretend to no Infallibility, and beg the Reader will be so favourable, to accept of this, as an Attempt only towards what will, no doubt, be hereafter more judiciously perform'd by abler Pens than mine.

Our

Our next Business is, to proceed to the Animadversions on Mrs. *Stephens's* Medicines, as Lithontriptics, after explaining the Figures that relate to this Description.



D 4 T A B.

T A B. I.

Fig. I.

Shews a Fore-View of the Bladder of a Man inflated, the Fat and Membranes being dissected off.

- A. The Urachus,
- B. The Detrusor Urinæ running down the Prostate Gland.
- C. The Ureters.
- D. The weaker Parts of the Bladder on the Sides, into the Back of which the Ureters are inserted,

T A B.

III.



IPs. MD. del.

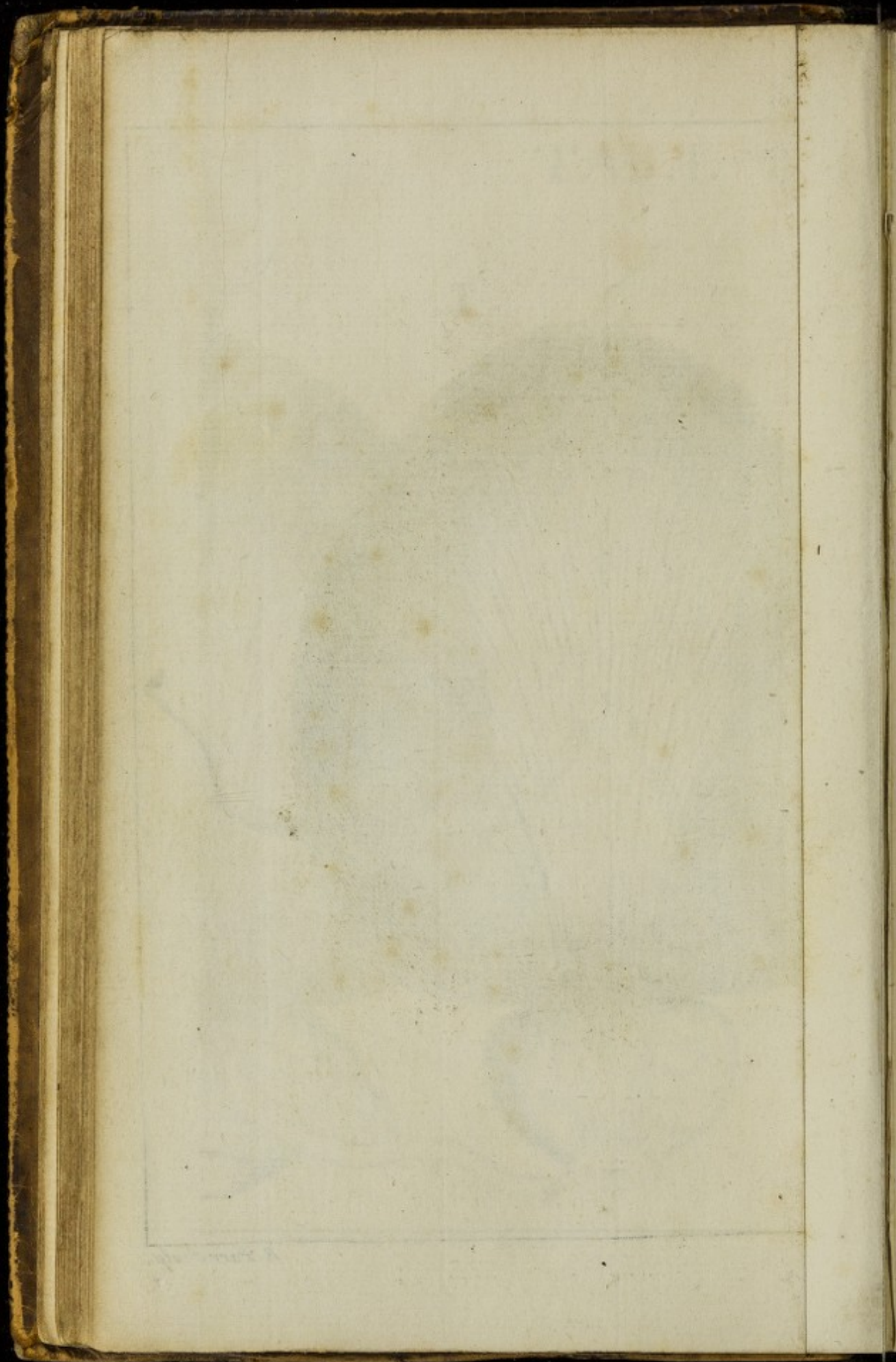
sculp.

TAB. I.



II. M. del.

R. Purr. Sculp.



T A B. I.

Fig. II.

Is a Back View of the same Bladder.

- E. The *Vesiculæ Seminales*, and Part of the *Vasa Deferentia* turn'd down upon the Prostate Gland, that the Insertion of the posterior Handle of the Detrusor may be seen.
- I. The membranous Ligament between the *Vasa Deferentia*.

T A B.

T A B. II.

Fig. I.

Represents a transverse Section of the Bladder, that the three Orifices may come in View.

- A. The internal or nervous Surface of the Bladder, which appears in *Rugæ*, and Inequalities.
- B. A *Stylus* thrust thro' the Ureter, and entering the Bladder under the Valve of the internal Orifice.
- C. The inner Orifice of the Urethra.
- D. The Out-side of the Bladder.

T A B.

III.



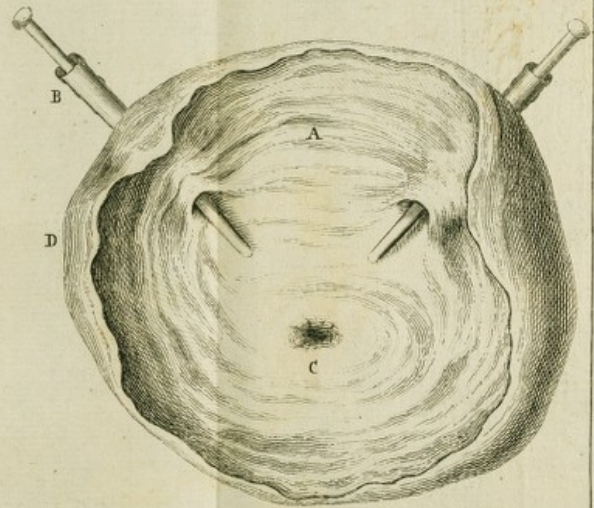
IPs. MD. del.

TAB. II.

II.



I.



J.P. del.

R. Parr sculp.



T A B. II.

Fig. II.

Demonstrates a View of the Side of the Bladder, to shew the Arch of the *Detrusor Urinæ*.

- A. The *Urachus* at the upper and broader part of that Muscle.
- B. The Insertion of the Urethra into the weak part or side of the Bladder.
- C. One of the *Vesiculæ Seminales*, part of the *Vas Deferens*, and the side of the prostate Gland.

T A B. III.

Fig. I.

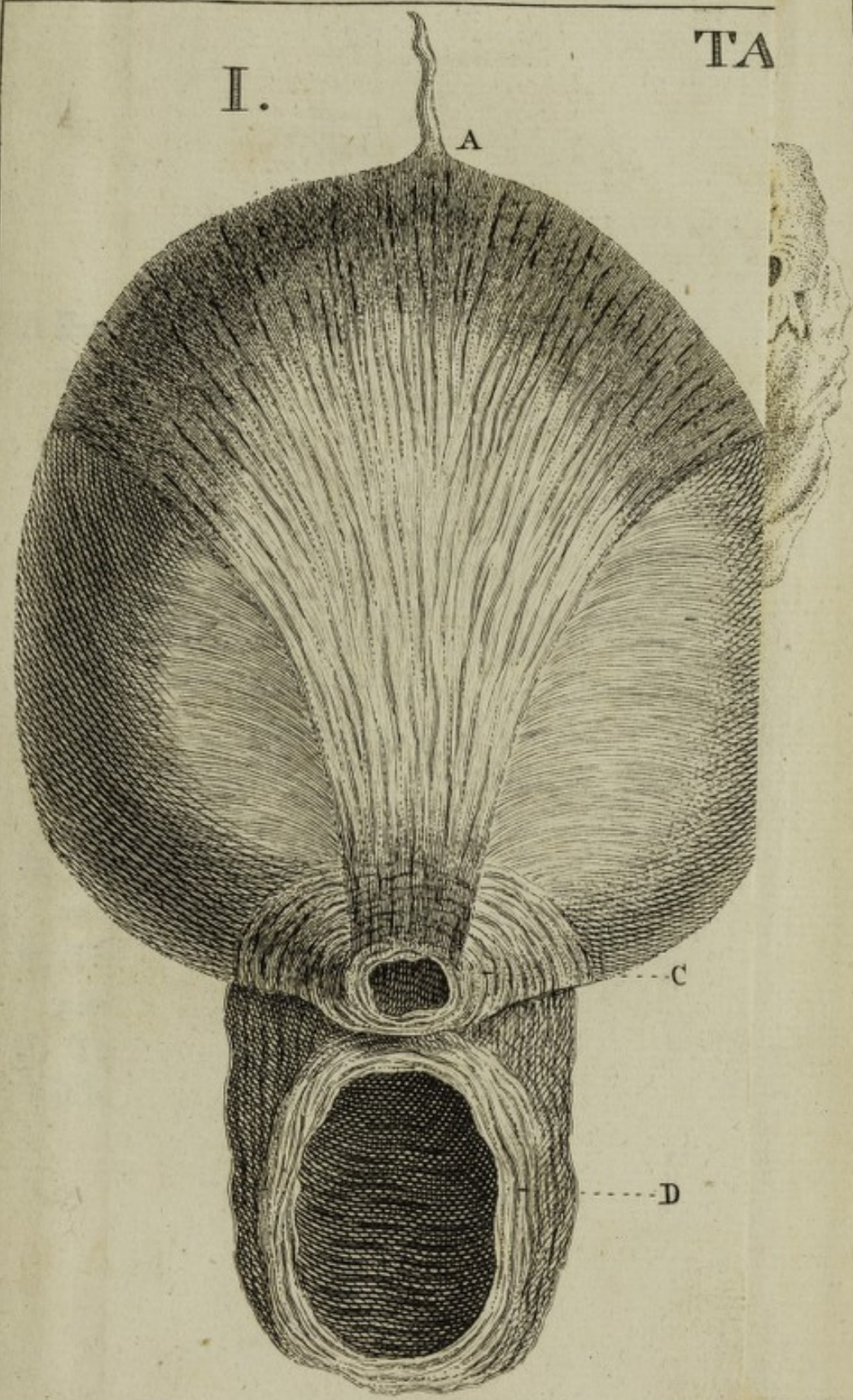
Is a Fore-View of a Feminine Bladder divested of Fat and Membranes, to shew how it naturally lies upon the Vagina, with their Orifices and Sphincters.

- A. The Urachus on the upper Part of the *Detrusor Urinæ*.
- B. The weak Sides of the Bladder.
- C. The Orifice of the Bladder, as it appears close to the Sphincter or circular Fibres, from which Part of the *Detrusor* springs.
- D. The circular Fibres, or Sphincter of the Vagina which is a little fore-shorten'd; and in which the *Rugæ* of the internal Surface of the Vagina appear.

I.

TA

A

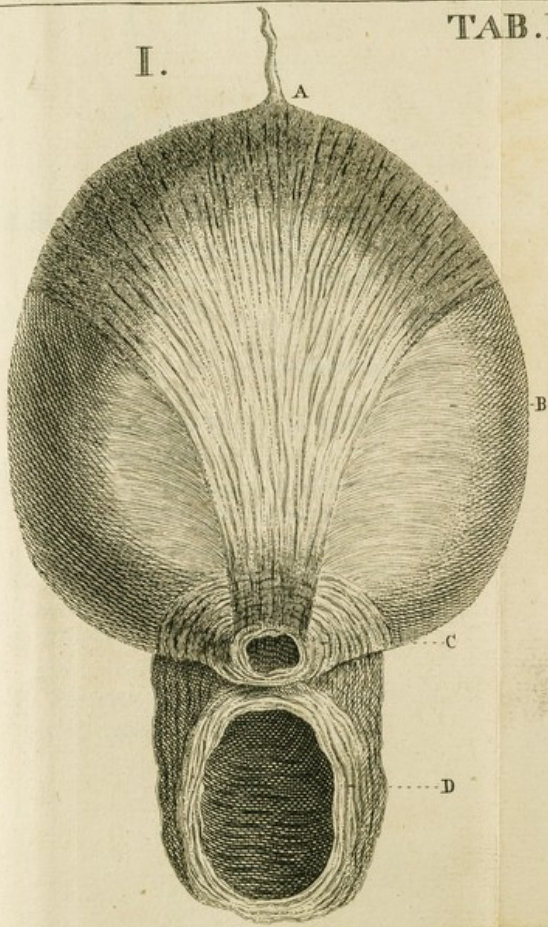


JPs. MD. del.

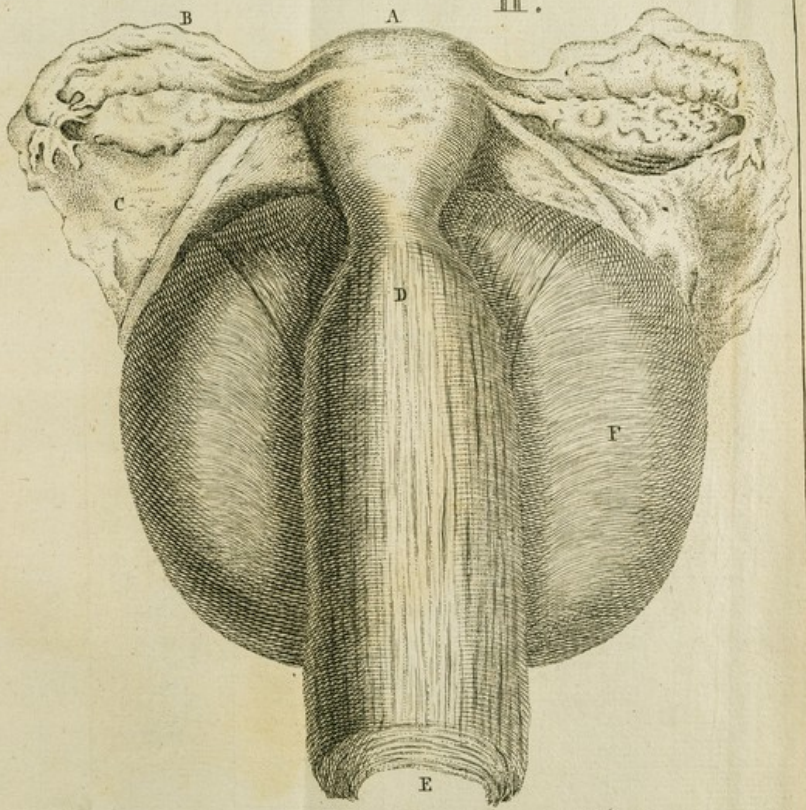
Parr Sculp.

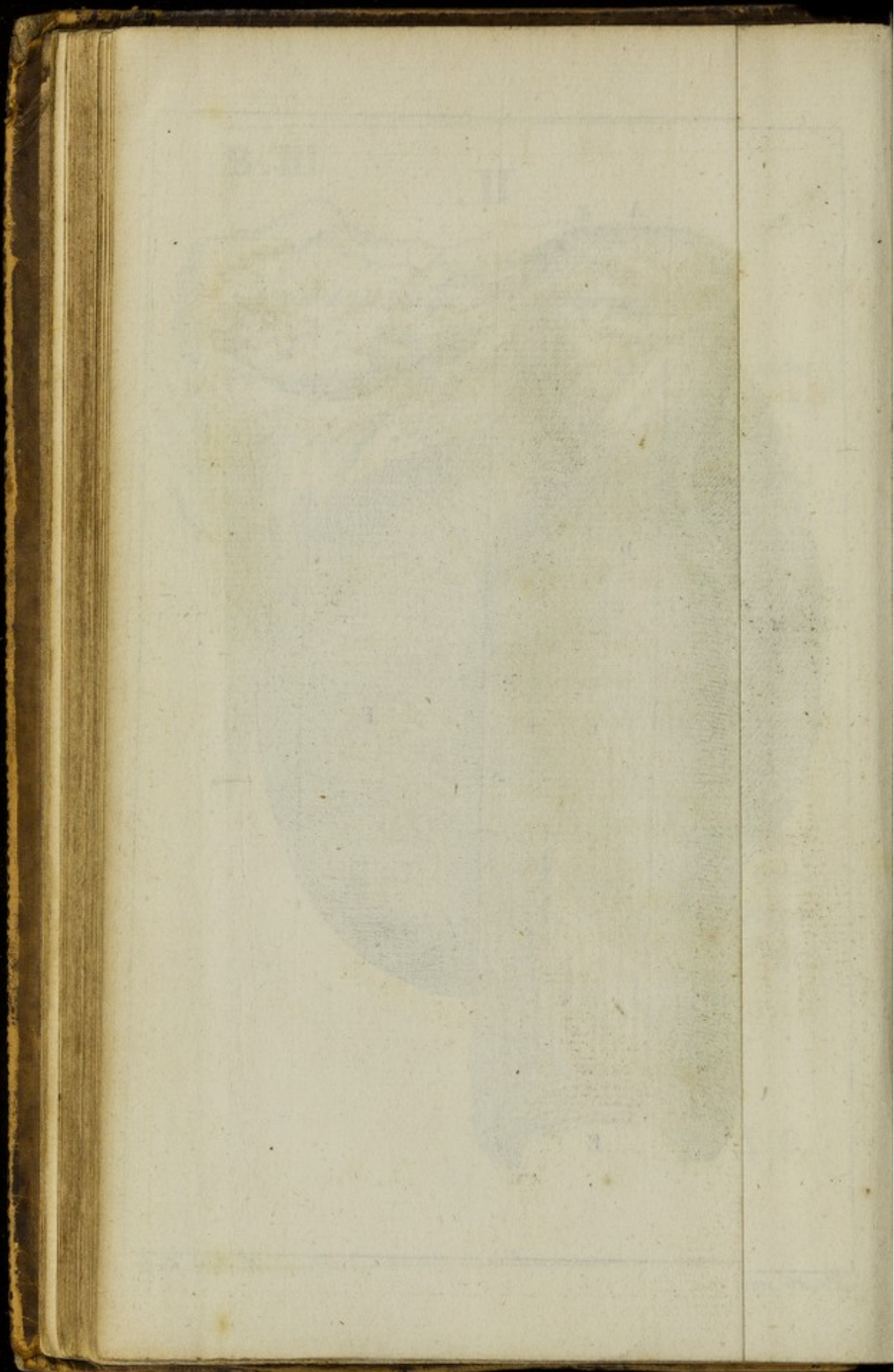
TAB. III.

I.



II.





T A B. III.

Fig. II.

A Back-View of the Uterus and Vagina, to shew that the greater Part of the latter is intimately cover'd by the Bottom of the Bladder.

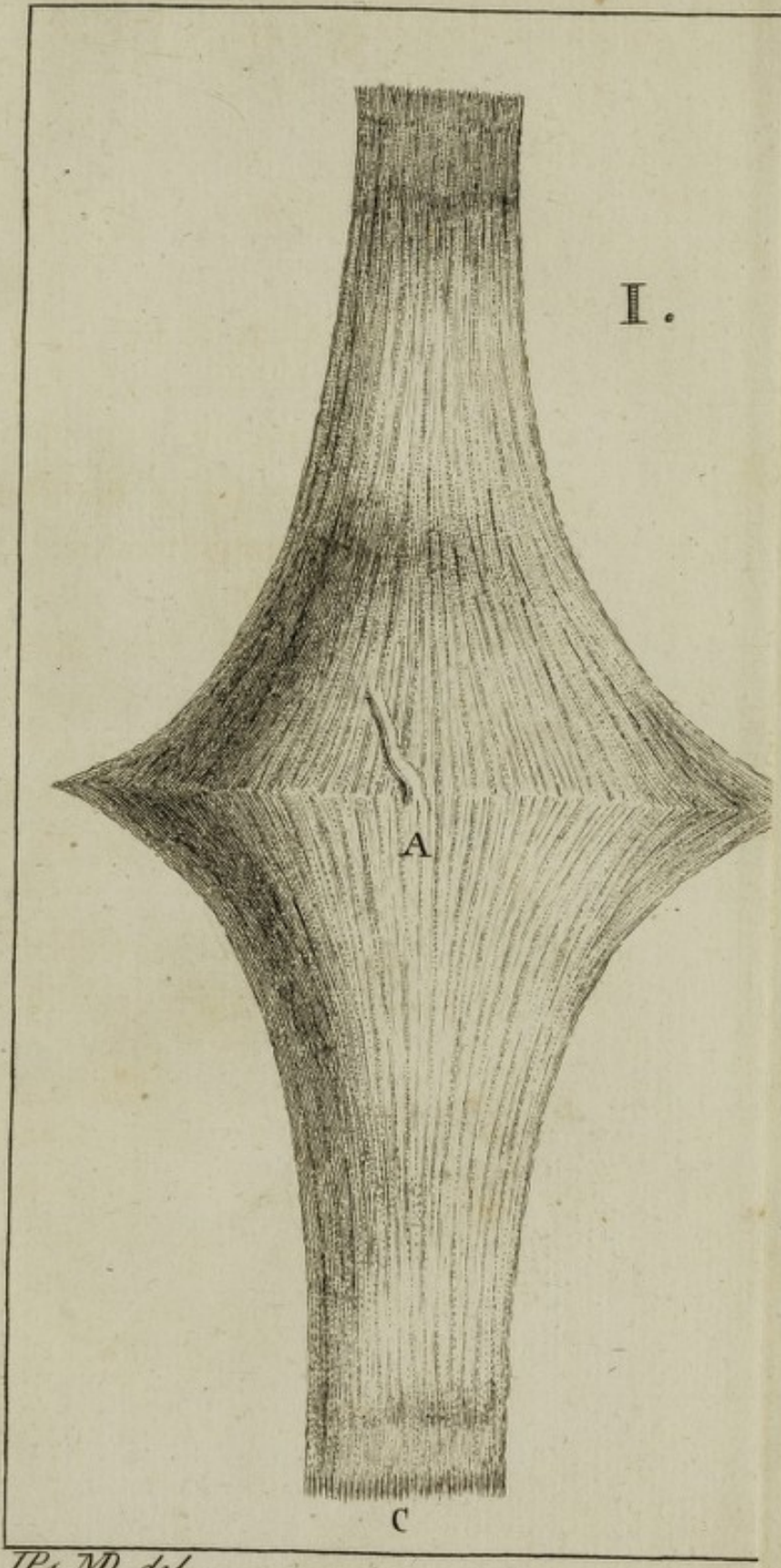
- A. The *Fundus Uteri* in a contracted State.
- B. The Fallopian Tube, as it opens towards the Ovarium.
- C. Part of the Peritonæum, commonly call'd the *Alæ Vespertilionis*, with the *Ligamentum Rotundum in situ*.
- D. The Beginning of the *Cervix Uteri*, and Ending of the Vagina.
- E. The Under-part of the *Sphincter Vaginae* cut off from the *Perinæum*.
- F. The true *Fundus* of the Bladder as it lies upon the Vagina.

T A B. IV.

Fig. I.

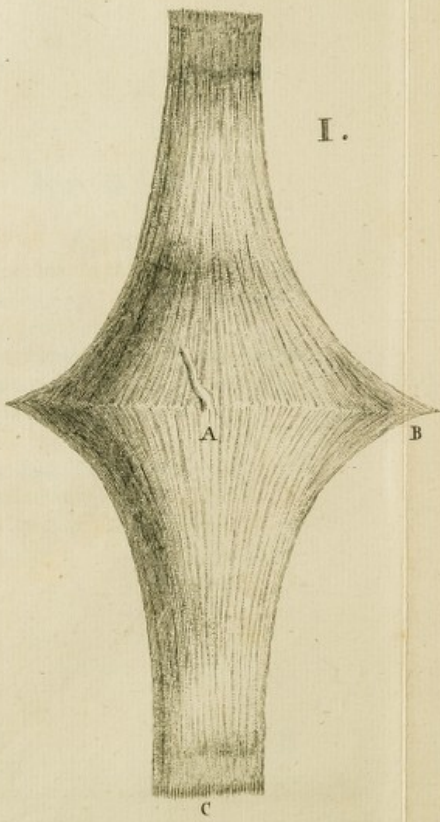
Shews the true Shape of the *Detrusor Urinæ* cut off and extended.

- A. The *Urachus in situ* upon the Center of the Muscle, where the Fibres being longer than on the Sides, cannot be extended to a perfect Plane, but must remain pursed up in the Middle.
- B. The Angle, over the weak Part of the Bladder, which we call the *Arch of the Muscle*.
- C. The Handle of the *Detrusor Urinæ*.

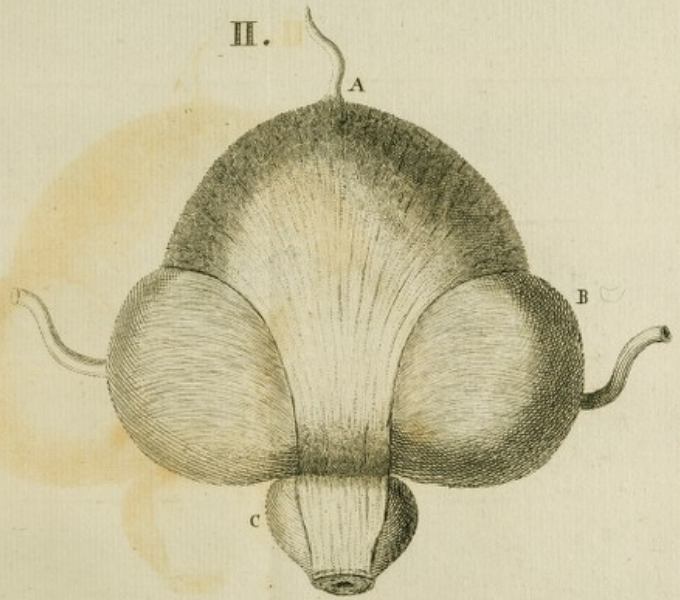


IPs. ND. del.

TAB. IV.



J.P. del.



R. Parr Sculp.

TAB. IV



T A B. V.

T A B. IV.

Fig. II.

Represents the Bladder full of Urine obstructed, and the *Detrusor* propelling the Urine, which is driven against the weak Sides by the Action and Force of that Muscle, whereby they are greatly distended.

- A. The upper Part of the *Detrusor*.
- B. The Side thrust out.
- C. The Prostate Gland.

- D. The Fallopian Tubes and Ovarium drawn from behind to come in View.
- E. The Ligamentum Rotundum in situ.

T A B.

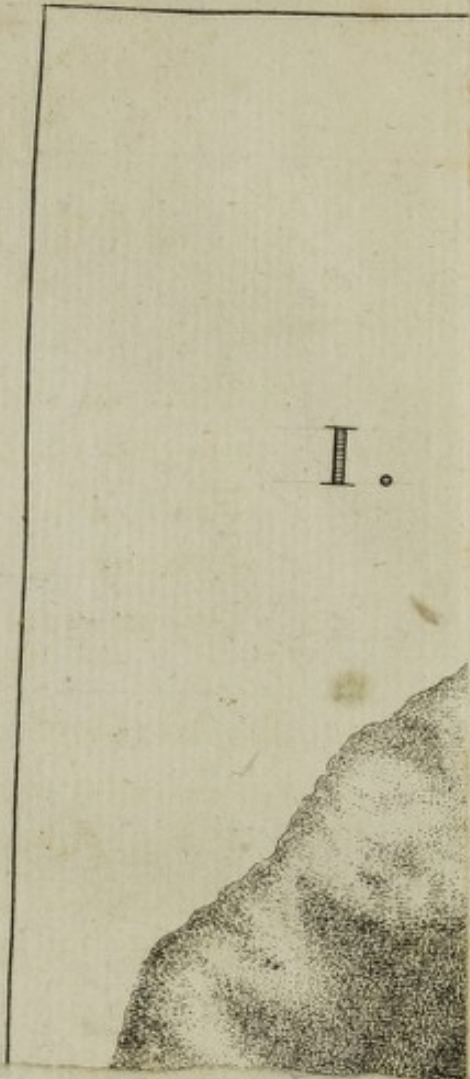
T A B.

T A B. V.

Fig. I.

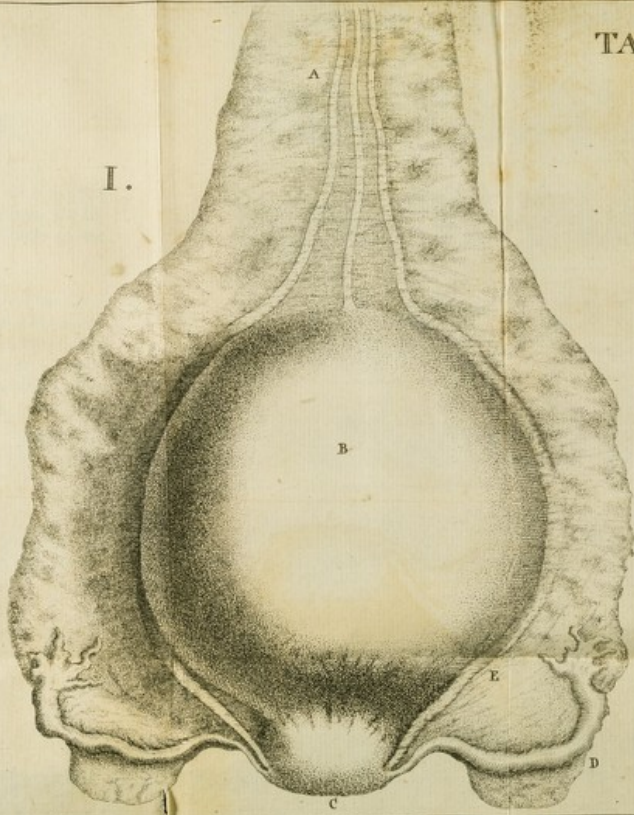
A View of the posterior smooth Part of the Bladder, with the *Fundus Uteri*, as they are united by the one common Integument the *Peritonæum*, in order to shew,

- A. The Duplication of the *Peritonæum* all round the Bladder, from the Fallopian Tubes, sustaining the *Arterial Ligaments* and *Urachus* up to the Navel, to each of which it gives a Covering.
- B. The Back of the Bladder as it lies over the *Uterus* when empty.
- C. The *Uterus* turn'd down, to shew the Duplication of the *Peritonæum* between them.
- D. The Fallopian Tubes and *Ovarium* drawn from behind to come in View.
- E. The *Ligamentum Rotundum in situ*.



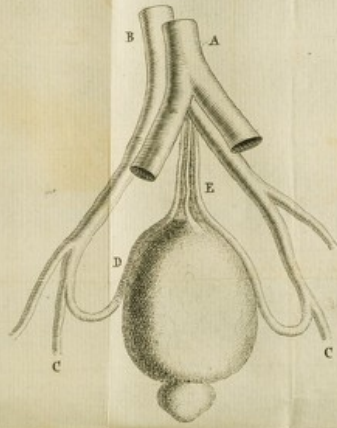
TAB. V.

I.

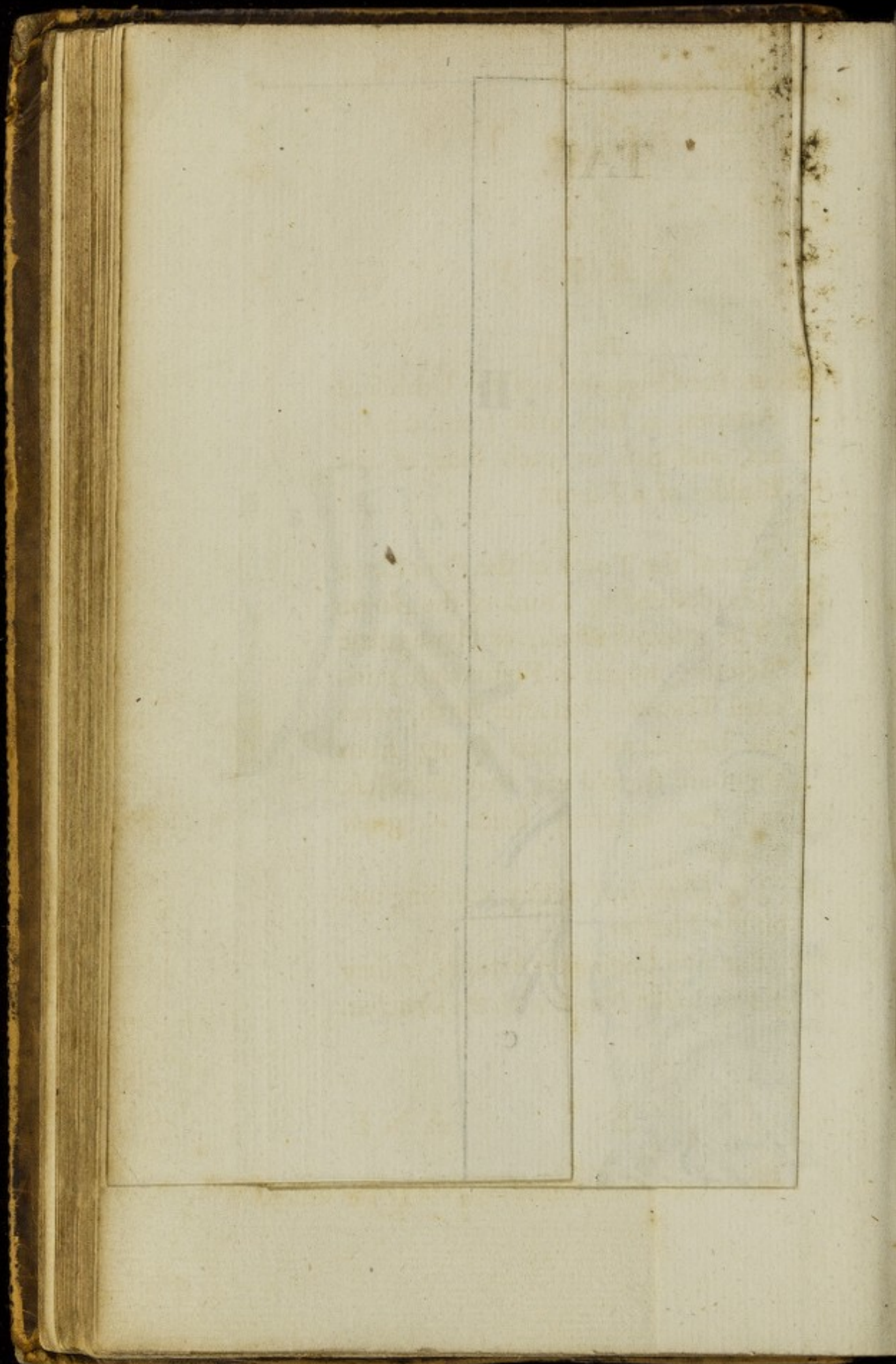


W. M. del.

II.



R. Parr Sculp.



T A B. V.

Fig. II.

Shews the Origination of the Umbilical Arteries, as they arise from the Iliacs, and pass on each Side of the Bladder of a Fœtus.

- A. Part of the Trunk of the *Vena Cava*.
- B. The descending Trunk of the *Aorta*.
- C. The internal *Iliacs*, or Hypogastric Arteries, which in Fœtus's are principal Trunks; but after Birth, when the Umbilicals which spring from them are stopp'd up, they grow less, and the external Iliacs + grow larger.
- D. The *Umbilical* Artery creeping upon the Bladder.
- E. The two *Umbilical* Arteries, as they pass up to the Navel with the *Urachus*.

T A B L E

Fig. II.

to show the Origin of the Umbilical
Artery, as they arise from the Em-
brion, and pass on each Side of the
Bladder of a Fetus.

A. Part of the Trunk of the Fetus.

B. The descending Part of the Aorta.

C. The internal Artery, or Hypogastric

Artery, which is Form'd and pin-

ced to the Trunk; but not birth, when

the Umbilical Artery begins to

form, and they grow

and the external Artery grows

larger.

D. The Umbilical Artery creeping up-

on the Bladder.

E. The two Umbilical Arteries, as they

pass up to the Navel with the Vein.

A N I

B



ANIMADVERSIONS

ON

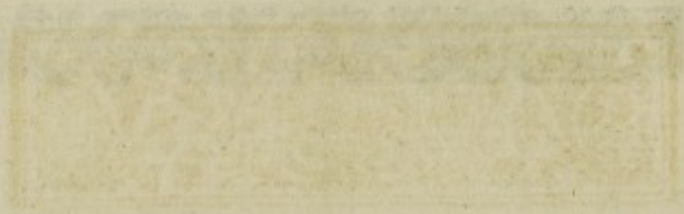
Lithontriptic Medicines,

Particularly those of

Mrs. *STEPHENS.*



1811



ANIMADVERSIONS
Animadversionum, &c.

Libertine Medicines


Particulars of the
Discovery of

of the Libertine Medicines
and their Effects on the
Human System. In a
good Lecture, delivered
to the Hon. the
Parliament of Great
Britain, in the
Year 1781.

By
J. J.



Animadversions, &c.


 HE Goodness of the Legislature, in inclining to encourage the Discovery of any Thing for the Welfare of the Public, ought to be for ever gratefully acknowledged. Nor is the good Intention of such as were ready to offer their best Endeavours to the Promotion of Mrs. *Stephens's* Medicines to the Knowledge of the World, to be less commended, in as much as nothing but the Benefit of their Fellow Creatures could be their Motive for it.

Every Man should think it his Duty to lay his helping Hand to the Cultivation of whatever might relieve another from Misery; but in this, as well as any other Acquisition, we ought to be well assured of the certain Utility of what we seek, by all possible Means.

These Medicines carried a specious Show of Efficacy for a considerable Time, and were generally believed both Stone-Dissolvers and inoffensive; but now, probably, it may be proved, they are not entitled to either Character; which could not before so well appear, because, from the Nature of the Disease for which they are used, it was only Length of Time that could produce sufficient and certain *Evidences* for or against them.

This we hope to make evident in the following Animadversions and Cases, by enquiring what is to be expected from Medicines published to the World, as efficacious in dissolving the Stone, since they

they have been so much cry'd up, and so great a Præmium given for their Discovery ; and whether they be endowed with those Properties that are absolutely necessary to render them of the general Use that is promis'd for them ; which we shall endeavour to do under the following Queries, *viz.*

I. *Can they be taken by all People?*

II. *Are they equally beneficial to all Ages, and do they actually dissolve the Stone in the Kidneys or Bladder?*

III. *Are they Medicines that cannot produce any ill Effects in the Body, since they are taken in such large Quantities, and no Limits set to the Length of Time in which they may dissolve the Stone?*

IV. *Were they never used before for any of the same Intentions?*



QUESTION I.

*Can Mrs. STEPHENS's Medicines
be taken by all People?*

THAT they cannot is most certain; 1. because (as it is plain) they are given in the same Forms and Quantity to every Person indiscriminately. 2. Because it appears in Dr. *Hartley's* View of the present Evidence, that they are so nauseous that many were forced to lay them aside, being utterly incapable to continue the Regimen; sometimes not in the full Quantity, sometimes not so often as is required, and sometimes not at all. See the Cases of Lady *Blomberg*, Mr. *Pym*, Mr. * *Lediard's* Son, Captain *Hardwick*, Mr. *Levi*, Mr. *Hill*, Mr. *Baron*, Mrs.

*Several at-
tempt in vain
to take them:*

* This Lad was cut, and a ragged Stone extracted weighing about an Ounce and half.

Mrs. *Bilby*, Mr. *Pilkinton*, &c. Some of whom, tho' they had taken the Medicines several Months before leaving them off, yet no Strefs was laid on any of them as to an Expectation of a Cure, nor was any Alteration attempted in the Form of them, for any one of these Patients. Hence it is something natural to conclude, that if the Conducters of the Medicines thought it practicable to alter them in their Taste, they would surely have attempted it, rather than lose so many Customers: But perhaps this would not be suitable to the alkaline Quality of them; and as to the Quantity, it might not be so proper to make any change in that for other particular Reasons. Yet one might imagine it would be as easy, if not more so, for a Patient to take a smaller Quantity of a nauseous Medicine, than a prodigiously large Quantity of one less nauseous, every Day.

*From their
being so nau-
seous.*

It is no wonder, so great a Heap of such disagreeable Stuff, to be taken e-
every

*Nauseousness
an Excuse for
their Inefficacy.*

every Day, and continued Month after Month, no-body can say how long, should make the stoutest Heart shudder at the very Thought. If the Medicines were agreeable enough to be taken in these two Circumstances, Quantity and Taste, there could be no Excuse for their want of Efficacy; but now there arises a very useful Apology for their Inefficacy, from their Unfavouriness and Bulk.

If a Man should say, I am not cured tho' I have taken them a Year; would it not be answer'd, he had not taken enough at a time, often enough in a Day, or continued them long enough? For, one capital Defence made by the Favourers of these Medicines is, that nothing can be proved against their Efficacy, without shewing that the Urine has incessantly been kept up in an alkaline State. I ask what hinders that? Why 'tis answer'd, the sufficient Quantity has not been duely taken. Every Man rack'd with the Stone would certainly be very willing

ling to conform to any Rules prescrib'd him, if in his Power; but you'll say all Stomachs cannot bear the Remedies, which you must indeed allow. They are deplorable indeed, whose Constitutions cannot bear these *efficacious* Medicines; because if the Quantity is less'n'd or any Change made in them to render them more agreeable to the Patient, that would be a sufficient Excuse; it being easy to say, their alkaline Quality is alter'd or not kept up.

*Another from
the alkaline
Quality.*

I believe there are no Physicians who would not prescribe these Medicines as well as any other *Formula* in the *Materia Medica*, upon proper Indications, but in the Course of their Practice many find them (and I have heard some declare they were Witnesses of their being) so nauseous, that it is in general impracticable. What avail the Virtues of Medicines that cannot be used? Are they not like Meat set before *Tantalus*? which he cannot touch? or Pelf in a Miser's Chest, while he perishes for Want? Where lies the general Good of

Reflection.

of any Medicine, in a Shape that cannot be suited to every Constitution? since it is obvious to every Judge, that all Constitutions are not, nor cannot be suited to these according to their present Standard.

In his Book *de Lithontrip.* the Author compares these Medicines to the *Peruvian Bark*, touching their certain Efficacy in dissolving the Stone. Whether there is a Right for this Assertion, will appear in the Sequel; here I shall only obviate an Argument made use of to me by a Favourer of the Medicines, in behalf of the great Length of Time required for taking them, and for their Nauseousness. 'He says, the Bark is also nauseous, and that many are obliged to take it a long Time, and in great Quantities.' To this it may be answer'd, that there is no Analogy between them, as to either Particular; for we are sure these Medicines are given in the same Form and Quantity to all, as directed by the * *Gazette,*

I

* From Saturday June 16, to June 19, 1739.

zette, &c. and as sure they are taken by such as are able, for a whole Year, nay longer, and that in vain, as shall appear by and by. The Dose of the Powders of these Medicines is one Dracm Averdupois, to be taken three times a Day, and each time half a Pint of the Decoction; and, if violent Symptoms come on, five of the Pills to be taken every Hour. This is a Regimen rather to be call'd a Diet than a medicinal Course, if three large Meals a Day may be thought so, or the devouring of one Hundred and Twenty large Soap Pills are entitled to it. Whereas a Drachm of the *Peruvian* Bark three or four times a Day in any agreeable Vehicle, is sufficient; and there are very few Instances of its failing to do Service, if genuine, in a few Days; the whole Quantity necessary for a Day, being not more than equal to as many Doses of *Mrs. Stephens's* Powders alone, exclusive of the Decoction and Pills.

Besides, the Bark if it should be disagreeable in Powder, may be, and is every
every

every Day, reduc'd to different Forms, most agreeable to the Patient ; as Infusions, Tinctures, Extracts, &c. and yet does not fail of its Efficacy. Thus it is easy to see how little Reason there is for the Comparison made between these Medicines and the Bark, and how much more might be said to prove they cannot be taken by all People ; but we shall be content with what has been offer'd, only adding a short Observation upon the following Paragraph of *Monf. Morand*.

Monf. Morand's Observation.

‘ † I believe, it cannot be determin'd
 ‘ how long these two Medicines should
 ‘ be used ; but this is no Discredit to
 ‘ them, since Persons for the Relief of
 ‘ more inconsiderable Diseases than the
 ‘ Stone, submit to long and repeated
 ‘ Courses of Mineral Waters, and other
 ‘ Remedies. And many Patients have
 ‘ found Success in taking these Medi-
 ‘ cines in Half the Quantity ordered by
 ‘ Mrs. Stephens.

Dr. Hartley

† See *Gem's Extract of the Exam.* &c. p. 34.

Dr. *Hartley* is of the same Opinion, as to the former Part of the Paragraph, when he says, 'After a Person has taken them above a Year, one cannot be certain as to the Time, &c.' as appears in some of the Cases that follow: And indeed so am I; because we know of no Stone that has been dissolved, whereby to fix a Period long or short, for the dissolving Power, as yet; and I cannot but think it therefore a great Discredit to the Medicines, since they do not inform us, after so much Bustle and Noise made about them.

But that this ingenious Surgeon should compare a Course of mineral Waters, or any other Remedies to these, is very particular: Mineral Waters are disagreeable but to very few, all may take them: These are, as all allow, nau-^{Confuted.}seous to every one. Mineral Waters may be left off and reassumed; so may other Remedies: These must be constantly continued, or not worth a Rush. Other Remedies may be vary'd according to whatever Indications arise in the Patient;

2

these

these must be the same in every Patient, even tho' a Contraindication is in the Way.

He says, 'Many Patients have found
' Success, by taking these Medicines in
' Half the Quantity ordered by Mrs.
' *Stephens.*' There may indeed be
Success in the Administration of less
than Half the Dose in washing any
Gravel, glaucous Matter, and the like ;
but it is not pretended, even by Dr.
Hartley, that any less will do, than the
full Doses, to dissolve a Stone in the
Bladder or Kidneys. But *Monf. Mo-*
rand speaks here in more general Terms
than he does in another Place, which
we shall observe in its Turn ; nor does
he know, that the Doctor has since de-
fended *Gardiner's* Case, by endeavour-
ing to prove, that this Patient, after he
was said to be cured, either took no
Medicines, or, if he did, that he did not
take the full Quantity. Of which see
more in *Gardiner's* Case hereafter.

To conclude this Enquiry, I must
observe, that it further appears, by an
Animad-

Animadversion of the learned Dr. Hales,
† that these Medicines are not to be rendered agreeable to any one, and at the same Time, to have the dissolving Power, they're said to have, preserv'd, viz.

The Difficulty of rendering them agreeable, confirmed by Dr. Hales.

‘ *Monf. Geoffroy* says, That he can make
‘ a liquid Soap with three Drachms of
‘ Salt of *Kali*, and one Ounce, four
‘ Drachms, and forty-five and one half
‘ Grains of Oil of Olives, which is not
‘ so nauseous as *Alicant* Soap; but as
‘ this Salt would want the Energy
‘ which Lime gives to the Salt of *Kali*
‘ or Pot-Ash in Soap-Lees, so it is to
‘ be feared it would be ineffectual. But
‘ if, instead of Salt of *Kali*, the dry
‘ Salt of Soap-Lees, when first evapo-
‘ rated, were mixed with this Quanti-
‘ ty of Oil, it might probably have a
‘ dissolving Power, and would then, if
‘ it should prove less nauseous than *Ali-*
‘ *cant*-Soap, be preferable to it; but I
‘ fear it would retain its Nauseous-
‘ ness.

F

From

† *Account of some Experim. and Observ. on Mrs. Stephens's Med.* p. 32.

From what has been said, I hope it sufficiently appears that these Medicines cannot be taken by every Body; we shall next proceed to the second Question, as follows.



QUESTION



QUESTION II.

Are they are equally beneficial to all Ages, and do they actually dissolve the Stone in the Kidneys or Bladder ?

Monsieur *Morand's* Observations upon forty Persons put under a Course of these Medicines, will sufficiently answer the first part of this Enquiry; I shall therefore transcribe it as I find it in *Mr. Gem's Account, &c.* as follows :
‘ † I divide the Patients who have taken these Medicines into four Classes, and keep separate Lists of them, specifying (1) their Ages ; (2) their Distempers ; (3) the Time they were under Cure ; and (4) what was observable in the Progress. But I shall here give only such a summary Account

Mr. Morand's Account.

F 2 ‘ count

† Sect. I.

‘ count of them as may serve for un-
 ‘ derstanding the following Examina-
 ‘ tion.

Class 1.

‘ The first Class consists of five Per-
 ‘ sons, who took the Medicines for
 ‘ Diseases of the Kidneys and Bladder
 ‘ different from the Stone. Such of
 ‘ those as complained of Disorders of the
 ‘ Kidneys, and of Nephritick Pains,
 ‘ appeared to receive Benefit: But the
 ‘ Medicines increased the Disorders of
 ‘ those who made purulent Urine, and
 ‘ consequently had some Ulcer in the
 ‘ Urinary Passages.

Class 2.

‘ The second Class consists of eight
 ‘ Persons, some of either Sex, who
 ‘ took the Medicines for the Gravel;
 ‘ two whereof reckon’d themselves per-
 ‘ fectly cured; four more were relie-
 ‘ ved, and two received no Benefit:
 ‘ But several of them brought away
 ‘ Stones, even of a considerable Size.

Class 3.

‘ In the third Class are six Patients,
 ‘ who had Symptoms of the Stone, but
 ‘ were

‘ were not search’d by the Catheter.
‘ One of them, who was near sixty
‘ Years old, took the Powders and the
‘ Decoction for almost three Months,
‘ and then perceived nothing of the
‘ Disorder; four others were relieved;
‘ two of them bringing away entire
‘ Stones, and the other two discharg-
‘ ing Pieces of Stone in the Form of
‘ Scales.

‘ The fourth Class consists of twen- *Class 4.*
‘ ty-two Patients of various Ages, from
‘ three Years old to seventy-nine; who
‘ were all examin’d by the Catheter,
‘ and found to have the Stone: Twelve
‘ of them were searched by myself, and
‘ the rest by Surgeons of Character.

‘ Two of these Patients having but
‘ lately begun to take the Medicines,
‘ we may reduce the Number to twen-
‘ ty, who have finished the Course.

‘ Of this Number, concerning whom
‘ a more settled Judgment may be
‘ form’d, there are four who took the
‘ Medicines

‘ Medicines but a very little while ;
 ‘ one found himself considerably relie-
 ‘ ved ; two received neither Benefit nor
 ‘ Hurt ; and the fourth, upon suffer-
 ‘ ing great Pain from the Stone, was
 ‘ cut, and a soft Stone extracted from
 ‘ him.

‘ Of the sixteen who took the Me-
 ‘ dicines for a considerable Time, there
 ‘ were eleven grown Persons, and five
 ‘ Children ; three of the grown Per-
 ‘ sons received no Benefit ; four were
 ‘ greatly relieved ; and four judged
 ‘ themselves perfectly cured.

‘ Only one of the five Children said
 ‘ he was relieved ; the four others were
 ‘ not relieved at all, and had the Ope-
 ‘ ration perform’d upon them, the
 ‘ Stones extracted shewing no Signs of
 ‘ Diffolution.

It would be needless to make any
 further Remarks upon the above Ob-
 servations of that ingenious Surgeon,
 than to take Notice, (1.) That of those
 forty

forty Persons who underwent the Course of Mrs. *Stephens's* Remedies, it appears by this Account, which we may be confident is impartial, that there is not a positive Instance of a perfect Cure. (2.) That the Children could receive no Relief at all. (3.) That the Medicines increased the Disorders of such as had Ulcers in the Kidneys or Bladder; (4.) That even of those said to have only gravelly Complaints, but two *thought* themselves cured; (5.) That only one, who had Symptoms of the Stone, but unsearch'd, *thought* he was cured; and, (6.) That of twenty-two who were searched, and Stones found, only four *judged* themselves perfectly cured.

Mr. *Gardiner*, and several others I could sum up, if it were necessary, thought themselves cured also; but Time, and an Inspection of the Bladder after Death, can alone discover the Truth of such a Cure. The above-mentioned † four Persons of those

F 4	searched,
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† *Gem's Extract*, Sect. III. p. 27.

searched, who thought themselves cured, were People of the most advanced Ages, as of sixty-five, seventy, seventy one, and seventy-nine Years old; which gave Occasion to *Monf. Morand* to say, that it should seem, the good Effect of the Medicines constantly decreases in Proportion as the Subjects are younger. And to add, that among the grown Subjects who might advantageously take the Medicines, there will be found some, whose violent Pains from the Stone may determine them to undergo the Operation, upon account of the slow Progress of the Cure.

*That Children
have no Benefit
from them,
proved*

Now, since the Progress of the Cure is so very slow, as to be protracted to sixteen Months Continuance, in vain; and that in Persons of advanced Ages; how long must we suppose in Proportion, ought those of a middle Age, and so on to Youth, continue the Regimen? Surely Numbers of Years, if the Proportion be gradual; because Children cannot receive Benefit from the Medicines.

That

That they cannot, is farther evident from another Part of Mr. *Morand's* Observation †, where he says, 'It appears by the Experiments made both in *England* and *France*, that Children are not capable of receiving Benefit from those Medicines; the Reason whereof is not hitherto discovered; at least, no satisfactory one as yet has been assigned. But here it happens fortunately, that Children are better fitted for the Operation of cutting; which is commonly perform'd more successfully upon them than upon grown Persons.'

From Mr. Morand.

There is indeed a great deal of Comfort in this: That since the Medicines cannot cure Children, there remains Cutting for them; and so it may be said of those more advanced in Years, as is plain by the above Calculation, and the several Cases hereafter-mentioned.

Mr. Mo-

† Sect. III.

Observation. Mr. *Morand* further observes, ' That
 ' the Operation whereby the Stone is
 ' taken away from Children, proves no
 ' Preservative against another, some
 ' having been cut seven Times over :
 ' But, (says he) if these Medicines can
 ' prevent the Parts of the Urine from
 ' concreting together, so as to form a
 ' Stone, (as it is probable from some
 ' Observations that they may) we might
 ' give them successfully to such Chil-
 ' dren, who, after being once cut, ma-
 ' nifest a Disposition to breed the Stone
 ' anew.

I am pretty much inclined to believe, if the Medicines are of no Service to Children in dissolving the Stone, they will be but of very little in preventing their Accretion ; but supposing they did, a Child must be doomed to take them all his Life, or take them in vain.

Confuted. It would be thought a very hard Sentence, if a vile Criminal was condemned for an Offence, to take three
 2 Meal

Meals a-Day of Soap, &c. for seven Years, and I question whether he would not think Death more eligible. That Author however confesses a great Uncertainty in taking them, even as a Preservative, in the Conclusion of this Paragraph. 'But be this as it will, (says he) there will not, perhaps, be wanting Subjects of all Ages for Lithotomy.'

Monfieur *Geoffroy* gives another Instance of Childrens having taken the Medicines in vain, and says, 'There were many other Children in the same Circumstances, but they intended to cut them directly. Now I should think, that this Instance, added to the Observations made in *England* since the Publication of the Receipt, may justly raise a Suspicion that the Remedy is only beneficial to grown Persons.

Monf. Geoffroy's Account.

From these Things it appears, and 'tis almost confessed, that they cannot at all be of Service to Children, to whom, if they

they could be efficacious, it would indeed be of singular Service to the World, as the useful Part of their Lives is advancing. Whereas those said to be cured by the Medicines, are only such as are stooping into the Grave; and therefore, if they were even infallible in old Subjects, it would not be sufficient to balance their Inefficacy in the younger Part of Mankind, which (besides) are more than five Parts in six of the human Race.

Enquiry whether they do dissolve Stones.

Our next Business is to enquire whether these Medicines do actually dissolve the Stone in the Kidneys, or Bladders of Persons even advanc'd in Years, which we shall attempt by considering the several Things urged in Favour of the Medicines, as Proofs of their dissolving Power.

From Ease obtained.

And first, of a Person's growing easier upon taking them. Intervals of Ease are very common in those troubled with the Stone, which I many times have been Witness to my self, tho' no Medicine

cine at all had been exhibited. There is no great Need of endeavouring to prove it, as it is so notorious to every Physician and Surgeon, and therefore we must in brief conclude with *Monf. Morand*, whose Province it is to be well acquainted with the Accidents of this Disease : ‘ That the ceasing of the Pains
‘ is no Proof the Stone is destroy’d ; for
‘ it may be objected, that in the com-
‘ mon Course of the Disease, there are
‘ sometimes Intervals of Ease for ma-
‘ ny Months, or even Years ; of which
‘ there are numerous Instances.’ It would be well if the Ease consequent to the taking of the Medicines, proves a happy Consequence of their Use, in those who continue long to take them ; but this we shall consider more particularly hereafter.

There might be some Pretence for saying a Man was cured because he was easy, if every Person who took the Medicines was observ’d to be eas’d by them ; but it is well known in many of the Cases laid down by *Dr. Hartley*, that
the

the Pains of several were increased by them. But there is no Question, if Pain had been formerly felt, (tho' an Interval of Ease was never so long) it would sooner or later return, upon Change of the Position of the Stone. Whereas if any Receptacle should confine a smooth Stone from its first Formation, whereby its Motion, or Rowling might be hindred, one might never be sensible of it.

Gardiner, Pain, Carteret, and others had Ease ; but did their Pain never return, and were not Stones found in their Bladders when they died ? One thing is worthy of observing, that most of those few that are said in the *View of the present Evidence*, to have found Ease and be cured, have obtained it in a very little while ; as in the Cases of Mr. *North*, Mr. *Brown*, Mr. *Stoughton*, Mrs. *Pool*, &c. whereas those who have taken the Medicines longest are found by Experience not to be cured, having died a small Space of Time after leaving them off, and supposing them-

themselves cured, for which see the following Cases. This shews strongly, that if a long Time cannot effect any thing (a shorter cannot) in dissolving Stones, and consequently that the Benefit received in a short time, is by People having only Gravel or Mucus to come away, and not Stones too large to pass. And in general, the Success of the whole Set of Classes in the *View of the present Evid.* runs thus: Some after taking the Medicines a considerable Time, have receiv'd neither Good nor Harm; others feel the same Complaints as before; some do not think they have quite so much Pain or Uneasiness as when they begun the Medicines; and in short, some are going on in Hopes of being cured; and at last a few are said to be well, and that in a little time, as is just now observ'd.

An Enumeration of the Success of the Medicines.

There are but a few of those Cases in that Book, that shew the Persons were search'd, whereby any Certainty might be had of their having the Stone; and it appears that the greatest Number
of

of them were drawn up by the Persons themselves; and yet they are all published as Cases of the Stone, one or two I think, excepted. But all Stoppages of Urine, all Stranguries or Dysuries are not caused by Stones; and of this Train of People who relate their own Cases, it is but reasonable to believe, that a very few were capable of giving a proper Account of their own, or that of any other.

*No Instance
of a Cure.*

Now if these were the efficacious Medicines pretended, if they were of the general Service expected, if they were worth the generous Præmium granted for them; ought not the Majority of the Patients under that Regimen, at least, be absolutely and without Equivocation cured? Instead of which, here is not an Instance thro' the Whole of a certain Cure, according to the Standard laid down by that judicious Surgeon, Mr. *Morand*, and to which I am perswaded every impartial Person must assent.

He

He says, after making all possible Enquiry into the Nature of these Medicines, and indeed favouring them as much as possible: * ‘ All we have said
‘ hitherto of the Virtue of these Medi-
‘ cines, is not sufficient to determine
‘ positively that they cure the Stone ;
‘ whilst it may be asked, whether any
‘ Patients have been search’d, not only
‘ before, but after taking them ; so as
‘ to give a Proof of their Cure by the
‘ *Catheter.*’ And in two or three Pa-
ragraphs after, he gives this as his de-
cisive Opinion, and lays it down as
positively as the Nature of the Thing
requires, as follows :

‘ There can be but one positive Proof, *Mr. Morand’s*
‘ which way soever we consider these *Proof of the*
‘ Medicines, and that is, the Stone be- *Certainty of*
‘ ing found by the *Catheter*, and the *a Cure.*
‘ Medicines taken with apparent Suc-
‘ cess ; then Opening the Body after
‘ Death, and finding no Stone in the
‘ Bladder. But it is Time only, and
‘ Opportunity that can fully inform us.’

G

That

* *Gem’s Account*, p. 30.

That Time is not as yet come, no such Proof is yet produced; tho' now, Time is a *Nuncio Veri* in this Matter, as well as in all others of Ambiguity, having amply shewed us beyond Contradiction, that these Medicines are not efficacious in dissolving the Stone, with other Things too, much to their Disadvantage, as we shall prove more fully in its Place. In the mean Time, I would ask one Question here, *viz.* Has *Henry Norris* had no Return of his Complaints since he was produced before the Trustees, as cured? and has he not asked any one's Advice when in great Pain? If he has, 'tis Time alone that now informs us of what did not appear before, concerning this, as well as many other Subjects. And, as a further Confirmation of the Inefficacy of the Medicines, I must here mention in brief, the Case of *Mr. Simson*, a Gentleman of Note in *Chapel-street* near *Red-Lion-street*, who had taken the Medicines about nine Weeks, and took them in their full Doses, during which

Time

Query, of Norris.

History.

Time he suffered great Pain, so as to be obliged to leave them off; and after several Months he endeavour'd to reassume them, but could not continue them, because of their Nauseousness, and the Pain they gave him; he therefore submitted to be cut; which was accordingly done, and a Stone of several Ounces Weight extracted by Mr. *Chefelden*, the Gentleman being, as I am told, in a fair Way of Recovery.

The above ingenious Lithotomist, Mr. *Morand* himself, lays no great Stress upon searching for the Stone; and it is plain from him, as well as from other Authors, that great Uncertainty attends it. He says; 'According to the Disposition wherewith this Affair has been examined, after the Use of the Medicines, it is easy to shew that all Trial by the Catheter is either insufficient, or superfluous.

Searching a Patient a long Time afflicted with the Stone, not having taken any Method to get rid of the Complaint,

Searching uncertain.

may admit of some Certainty, otherwise Lithotomists could not resolve to perform the Operation. But searching in a long Interval of Ease, either by the Use of Medicines, or without them, may be allowed uncertain, because, the *Lusus's* of Nature are many, and Stones that have once fluctuated freely in the Bladder, and been felt before, may not be felt afterwards: For, (1.) They may have acquir'd Integuments of membranous Productions to cover them, so as not to be sensible to the Touch of the Catheter. (2.) They may have protruded the inner Membrane of the Bladder into *Sacculi*, and have lodged in them. (3.) They may be circumvolv'd by a tenacious *Mucus*, so as to make a Resistance, so like that of the Bladder itself to the Instrument, that might deceive the most experienc'd Artist.

1. *Encysted
Stones.*

The former of these, the Encysted Stones, we find mentioned by a Number of Authors; we shall enumerate a few by way of Vouchers: *Holler*. † tells

† De Morb. intern. Scholiograph. c. 49. l. 1.

tells us of a Merchant who had all the Signs of the Stone, yet none could be found by the Catheter; but after his Death two large ones were found, each inclosed in a Membrane in the Bladder.

* *Ambrose Parée* tells us, 'tis Death to a Person if a Stone is included in a Membrane; he says, *These Stones are not to be felt by the Catheter.*

† *Martin Holtzapel* gives a History of a Nobleman who was searched, and no Stone found, yet he was cut, and still the Surgeon could feel no Stone. He died the eighth Day, and the whole Bladder was taken out of his Body, and thirty-two Stones, (the smallest as large as a Bean, the largest half an Ounce Weight, all alike in Colour, every one wrapp'd round by a Membrane of its own) were found, which filled the whole Capacity of the Bladder, except a small Passage for the Exit of the Urine.

G 3

‡ *Tulpius*

* Lib. 16. Cap. 39.

† Skenk. *de Ves. Urinaria*, Obs. 269. parag. 6.

‡ *Tulpius* has a Case of a Senator of *Amsterdam*, who had twenty-nine Stones in his Bladder, differing in Figure and Size, but alike, *Forma, & Glabritie ac Levitate*, all of the *Bezoar* Kind: Each of these had a Coat about it, in-
 somuch as the Surgeon was deceived, believing no Stone was there, till the Body was opened. This Author mentions also the Case of *Casaubon*, whose Bladder he calls *Vesica Rugosa*, in which was a vast Number of Stones, which being so inclosed, might have evaded the Perception of a skilful Surgeon.

I might here add a great Number of the same Nature, but believe these are
 2. *Of Sacculi.* sufficient to prove the first. And as to the second Manner of being deceived in searching, Mr. *Gardiner's* Bladder is a sufficient Evidence for the *Sacculi*. As
 3. *Mucous Coverings.* to the third, that is, the mucous Matter invelloping the Stone, * *Skenkius* has

‡ Lib. III. c. IV.

* Lib. III. *Obs.* 269. parag. 7.

has a History of a considerable Person who had a large Stone so covered with a thick *mucous* Humour, that it could not be felt by the Surgeon, who, tho' the Patient had other Symptoms of the Stone, introduced the Catheter in vain, to his great Surprise. † *Jacob. Holler. Marcell. Donatus* has likewise a Case of the same Nature. And the learn'd * *Tulpius* says, he saw Stones with such Coverings like Membranes, which fluctuated in the Bladder, and were voided by two Women. And in another † Place gives an Account of two large Stones found in the Bladder of a young Man, so surrounded with a thick *Mucus* and *Pus*, that the Surgeon could not feel them in the least. Many other Authors bear the same Testimony; but these are enough to shew, how many Causes there may be of Uncertainty in searching for the Stone; and therefore I am induced to conclude

G 4

with

† *Hist. mirab. Med.* l. 4. c. 30.

* *Ch. V.* p. 188.

† *Ibid.* Ch. II. p. 184.

with Mr. *Morand*, that Examination by the Catheter cannot determine 'whether the Stone be abolished by the Effect of the Medicines.'

*Different
Kinds of Cal-
culi.*

The *Calculi* of Bladders differ greatly from one another, tho' let the Number be never so great in the same Bladder, they are all alike. Some are hard and brownish, with smooth Surfaces, as those of *Gardiner*; some smooth and whitish, or greyish, as those which fill a Bladder, which was shewed me by our much-to-be-lamented Friend, Dr. *Douglas*; some are granulated and hard, like that of Mr. *Smith* of *St. Albans*; and some unequal and ragged on the Surfaces, as if prick'd with an Instrument.

*Pretence of
Erosion by the
Medicines.*

These are all Stones, *sui generis*, form'd differently, according to the different manner of their Concretion, and the various Combination of the stony Particles, with the different Strength of their Attraction, and other Accidents which are abstruse to us; and
I yet

yet this one Kind with the ragged Sur-
faces, when found in the Bladders of
two or three who had taken Mrs. *Ste-*
phens's Medicines, were pretended to have
been rendered so by the Action of these
Medicines. This would be a tolerable
good Plea in their Favour, if there ne-
ver were Stones with the same Appear-
ances in those who never took them ;
but here we can produce several Ex-
amples of Stones with Surfaces seem-
ingly eroded, some of different Animals,
which are in the *Musæum* of the *Royal*
Society, others of the human *Calculi*,
two Cases of which will be sufficient
to shew, that Arguments or Expecta-
tions founded upon such Appearances,
are but weak Evidences of the Efficacy
of the Medicines.

The first I shall mention, is a Stone
found in the Bladder of a worthy Ma-
gistrate's Son in the City, which had all
the Appearances of Erosion that could
be in a Stone of that Nature ; who was
so far from taking any Medicine for it,
that, during the Time of his being in

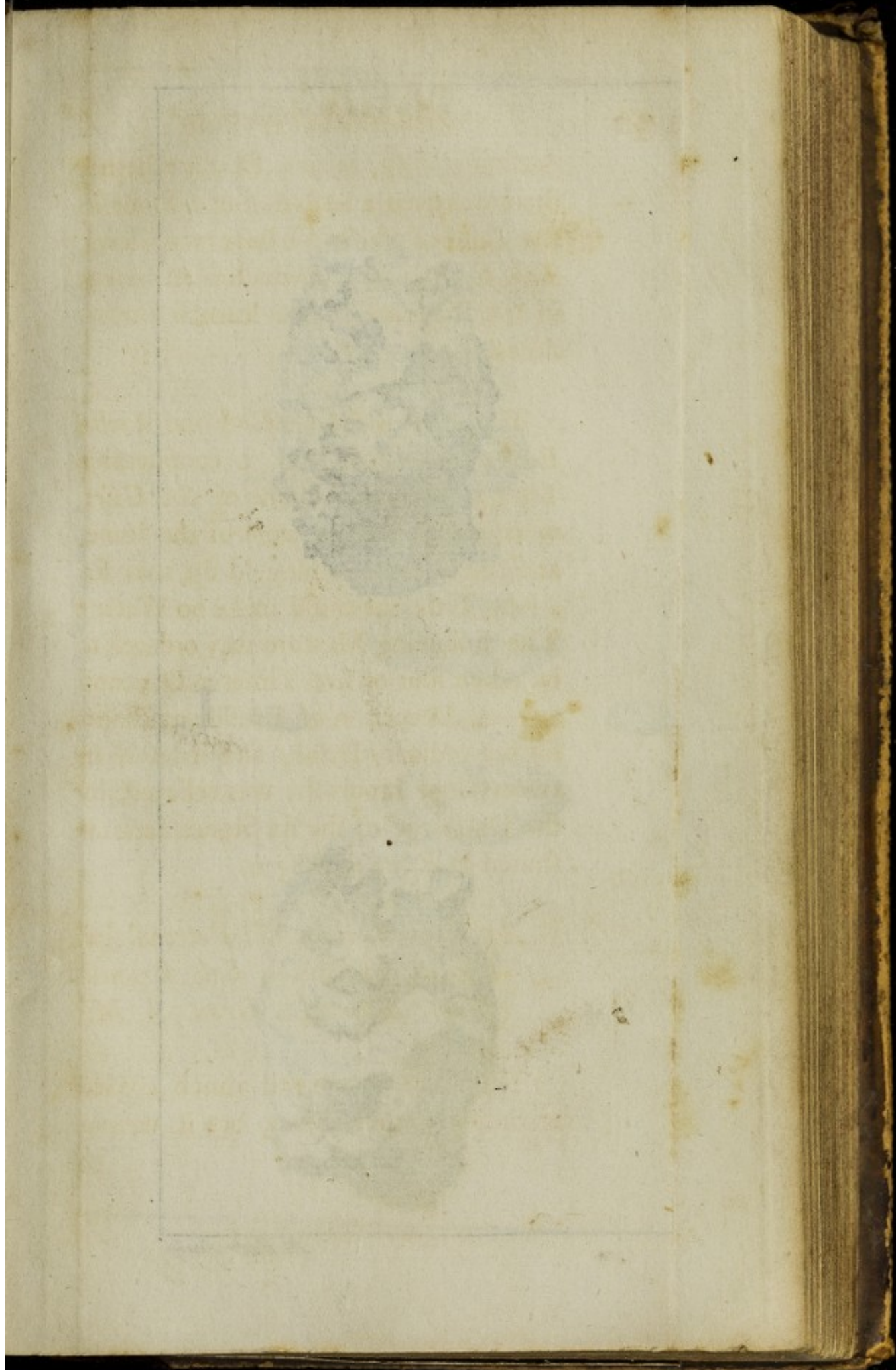
*Eroded Sur-
faces without
Medicines.*

declining Way, it is a Doubt whether there was even a Suspicion of a Stone in this Case; of which you have two Views, *Tab. 6. Fig. 1.* and which is at present in the *Musæum* of the learned Doctor *Mead.*

The other is the Case of one *Rachel Eaves*, who had been a considerable Time in the Work-house of *St. Giles*, who had all the Symptons of the Stone, and the Urethra so plugg'd up, that for a long Time she could make no Water: The following Mixture was ordered to be taken four or five Times a-Day, and a strong Decoction of Emollient Plants for her ordinary Drink, and in less than twenty-four Hours she was relieved, by the Discharge of the six Stones demonstrated in *Plate 6. Fig 2.*

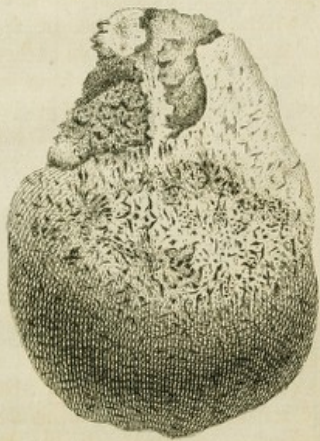
℞. *Aq. Raphan. comp.* ℥ii. *Petrofel.* ℥vi.
Syr. de Alth. ℥ii. ℥s. *Sal. Prunell.*
Mart. Absynth. ā. *Gran.* xii. *M.*

The Stones were all much eroded according to their Sizes, but it cannot



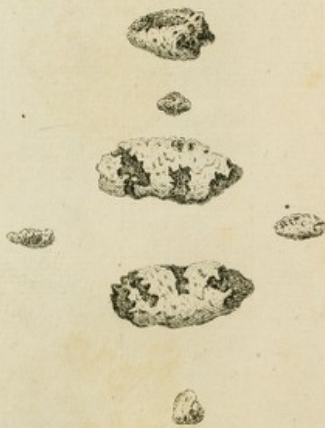
TAB. VI.

III.



J.P. M. del.

II.

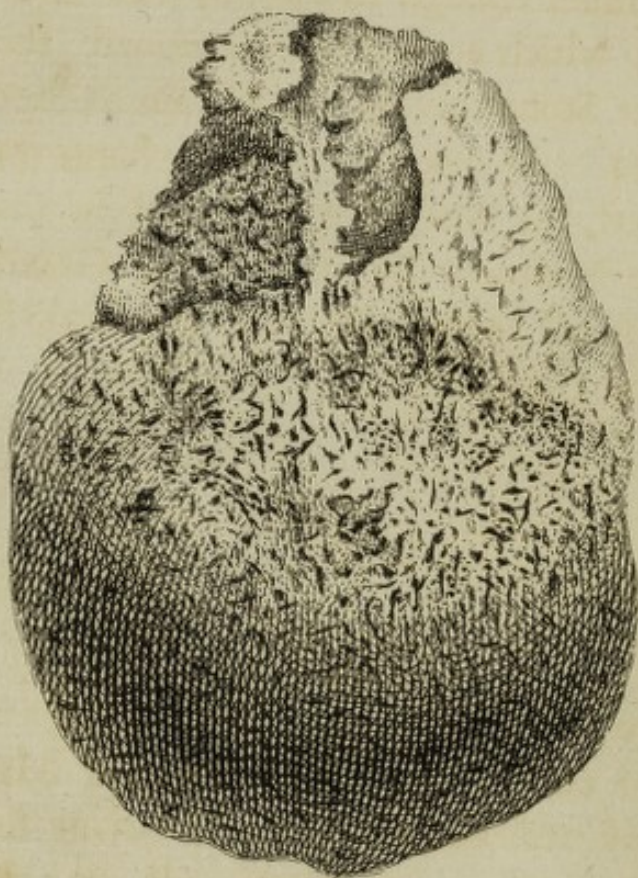


I.



R. Parr Sculp.

III.



IPs. MD. del.

be pretended the Medicines had that Effect on them in twenty-four Hours; but as the Mixture is very Diuretic, and the Decoction a very lubricating Emollient, all that was expected from them, was the Expulsion of whatever was small enough to pass by the *Urethra*, which accordingly happened, the larger Stones giving much Pain as they passed. As often as her Complaints returned, she was always relieved in the same Manner, by discharging Gravel and small Stones, less than the smallest of the Figures.

T A B. VI.

Fig. I.

Shews two Views of a Stone taken out of the Bladder of the foresaid Magistrate's Son of the City, having the Appearance of *Erosion* all over its Surface, without the Help of any Medicine whatever.

Fig. II.

Fig. II.

Represents six Stones voided by an ancient Woman in the Work-house of *St. Giles*, which are also eroded. The two large Figures are different Views of the same Stone.

Fig. III.

Demonstrates the Stone taken out of the Bladder of *Mr. Smith* of *St. Albans*, after the Use of *Mrs. Stephens's* Medicines for 16 Months, weighing six Ounces wanting one Scruple.

There is also an old Gentlewoman in the same Place, subject to these Complaints, who is relieved by voiding small Stones like Pease as often as she has a Difficulty of making Water, and takes these Remedies, of which she has a Box-full; and tho' I never knew these Prescriptions fail of promoting the Discharge of Urine in Stranguries, yet I cannot say they dissolve Stones in the Kidneys or Bladder,

As

As to the harder Kinds of Stones, I Harder Stones
not dissoluble in
the Bladder. believe, impartial Judges will think it vain to expect they can be dissolved in the Bladder; because if a Menstruum, thought strong enough to act upon them, be taken into the Body, what must be the Fate of those Parts thro' which it passes, or the Bladder in which it rests some Time; whose Parts are flexile, membranous, and consequently more liable to suffer by the corrosive Action of such Medicines than the Stones they contain? † *Tulpius* was of this Opinion, who says, 'Nothing is more frequently talk'd of amongst Physicians than Medicines for breaking the Stone; but we ought to consider such, as the most soft ones; for those

† Nihil Medicis frequentius in ore, quam medicamentum calculum frangens. At vide sis arenosos ac molles duntaxat intelligas: filices quippe ut vix comminuunt Mallei, sic profecto multo minus acris aliquis Humor, qui fortassis aptior foret exedendis tenuibus vesicæ tunicis, quam præduris lapidibus. At excogitabit fortè aliquis Remedium, quod sine aliarum partium jactura, ingenita proprietate, solos calculos dissolutum ibit.

' those that are flinty, as they can hard-
 ' ly be broken with a Hammer, so in-
 ' deed much less by any acrid Liquor,
 ' which, perhaps would be more apt
 ' to eat away the tender Coats of the
 ' Bladder than such hard Stones. But,
 ' perhaps, some may find out a Reme-
 ' dy that shall only dissolve the Stones,
 ' by an innate Property, without da-
 ' maging any other Part.

Here *Tulpius* merely banters the Pre-
 tenders to infallible Stone-dissolving
 Medicines; the last Paragraph shews
 how he contemned such Notions.

To imagine an innate Virtue in Me-
 dicines, that can only act mechanically
 upon Bodies, would be granting a Kind
 of judicious Choice to the Medicines, or
 making them capable of obeying Com-
 mands not to touch the Bladder, but
 the Stones. What ridiculous Lengths
 are Men, apt to run when once they set
 out wrong! Surely the greatest Favourer
 of these Medicines of *Mrs. Stephens* must
 be

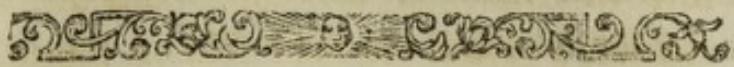
be of the same Opinion, if courteous enough to himself to think seriously of them. Even *Monf. Geoffroy*, as well as *Monf. Morand*, speak of them with Distrust all along, and are pretty positive in their Opinions of their not being capable of dissolving hard Stones. The latter says, 'He does not think, they can have any Effect upon what he calls the *Mulberry Stones*;' and the former, after he has allowed them all the Favour he can, says, 'This Remedy promises Success with Stones not hard enough to resist the Action of a Liquor that contains nothing stronger than an Alkaline Salt; but we may be too sanguine to expect it should act upon such hard Stones, as perhaps nothing but *Acids* will dissolve.

I am afraid Promises are no where more frail than in this very Affair; the Promise of Success has not yet appeared to be fulfilled; the Conditions are, where Stones are not hard enough to resist a Liquor no stronger than Alkaline Salt can make it; there are but few

few of those in human Bodies; for as friable Stones are very seldom found, so we can expect to find but few Examples of Stones broken in the Kidneys or Bladder by Medicines. This leads me to consider the Nature of those white Particles so often mentioned to have been voided by the Patients, in the *View of the present Evidence.*



I can think of no other
 more full than in the very
 Promis of success has not yet
 to be fulfilled, the Conditions
 where Stones are not hard enough
 of a liquid no stronger than Alka-
 lic Salt can make it; there are but
 few



Of the Calcarious Matter.

THEY are so often met with in the Forms of Flakes, Sediment, Bits, chalky Matter, and such like, thro' the Cases of that Book, that one would almost believe there were no other Kinds of Stones but rotten white ones in all Mrs. *Stephens's* Patients: This white Matter, so discharged, amounts to so great a Quantity, that, as Mr. *Freke* once observed, if they were Parts of Stones once dissolved, that of every Patient might be easily supposed as big as one's Head. Upon this Objection Dr. *Hartley* seem'd not to dwell upon the white Matter as Stone, but rather depended upon real Pieces, which he said he had collected from Mr. *Gardiner*, amounting to some Ounces Weight. Whether this was so, or no, I shall not here endeavour to determine, but shall leave the Reader to judge of

*Mr. Freke's
Opinion.*

*Dr. Hartley's
Plea.*

H the

the whole Matter, when he comes to consider Mr. *Gardiner's* Case.

Tho' the Doctor does not, upon that Dispute, insist upon the white Matter's being Stone, yet in some Places of his Book before-mentioned, the white Sediment has been dryed, and said to concreate into a stony Mass, which I take to be a Kind of Insinuation of its being Stone dissolved; otherwise, of what Use was it to mention such Concretion in the Cases? Is it not evident every Day, that slack'd Lime, or any other calcarious Matter may be concreted into a hard Substance when the Moisture is exhaled: However, in order to carry this Enquiry a little further, let us consider the Matter voided by the Reverend Dr. *Kirkpatrick*, as delivered by himself, and see whether he could have a Stone, or Stones, that could amount to that Quantity.

Dr. Kirkpatrick's Case.

This Gentleman voided one thousand and thirty-six *Flakes*, which he calls *Flakes of Stone*, besides the great Quantities

tities of white Sediment and angular Bits all along, exclusive of some small Stones, one of which, by the by, was red; this plainly proves this Bulk of white Matter is purely calcarious, all the Stones of the same Bladder being of the same Kind, as shall be prov'd more at large, when we come to *Gardiner's Case*.

He was fond of believing all these were Stone, having, as appears by his Letters to Dr. *Hartley*, made the Experiment of forming the white Sediment into little Balls, and drying it, and calls it a calculous Mass, having no Appearance of any Thing saponaceous.

What Credulity! what Fondness of believing what we wish for is come to pass! By telling us it is a calculous Concretion, having nothing saponaceous, in his fifth Letter; he signifies, that therefore it was not any Part of the Medicines that appeared like Flakes or Sediment, but real Stone. But he forgot that in his † third Letter he says,

H 2 . ' I

† *View of the pres. Evid.*

‘ I always scum off the Film of my
 ‘ Urine before I filtrate it; if you ne-
 ‘ glect it, your Sediment will be more
 ‘ saponaceous; mine was so once, but
 ‘ after taking off the Film, the white
 ‘ Sediment always concretes into a cal-
 ‘ culous Mass.’ He says further, that he
 broke this Mass, and viewed the Pieces
 in his Microscope, and it had the same
 Appearance, in all Respects, with the
 Flakes of Stone he passed, and that the
 one could not be distinguished from the
 other. Now, because *Dr. Hartley* was
 willing something should be said of this
 learn’d Gentleman’s Case, upon which
 he lays great Stress, take this summary
 Extract of what is material.

*His Regimen
 before that of
 Mrs. Ste-
 phens.*

He tells us, that for more than seven-
 teen Years he was troubled with Ne-
 phritic Paroxifms; that he seldom had
 above one in a Year; that they lasted
 him about twelve Hours the shortest,
 and the longest about thirty; that he
 passed several Stones, and sometimes
Mucus; that the Regimen he pursued
 was, warm Baths, emollient Clysters,
 saponaceous

saponaceous Balsamic Medicines for relaxing and opening the Vessels, and Diureticks for carrying off what was passable; and this from time to time. There is no Doubt to be made, but that if he had been as constant in the Pursuit and assiduous Continuance of this Regimen, as he was afterwards in that of Mrs. *Stephens*, he would have done better, without that Torture he suffered all along, and without the Discharge of the white Flakes, &c. which he calls Stone. Here we see he used saponaceous Medicines, which with the other Things, were better, and more safely calculated, than when the Powders were brought in Play, and the nauseous Decoction.

He consults some of the Faculty, who were of Opinion he had a Stone; tho' it does not appear that he was search'd: However, he sometime after hears of Mrs. *Stephens's* Medicines, which he takes, in the manner laid down in his *Diary*, and voids the Flakes, &c. besides three small Stones during his taking

them, which was from *October 17. 1738.* to *April 23.* following.

He voided Stones during his former Regimen, but no white Flakes, because the Medicines then taken had not a Fund of calcarious Matter to supply them; but as soon as *Mrs. Stephens's* Medicines came in Play, he soon had Flakes, Sediment, &c. As had also the other Patients.

What else remains, is, that he produces a Certificate of several Gentlemen, to prove that the Diary was a Relation of Facts; that they had seen and handled a large Number of the Flakes, (which they also called Stone) and a considerable Number of calculous Concretions form'd out of the white Sediment, separated from his Urine by Filtration; and three large Stones passed by him during the Use of the Medicines: And then he sums up the Whole in these Words; 'To set all my Observations in one Point of View, the Sum of the Whole is this: Five
'Stones

‘ Stones have been dissolved in my Blad-
‘ der, and discharged in Flakes, Bits,
‘ Scales, Particles, an impalpable Pow-
‘ der, and the *Nuclæi*, agreeable to all
‘ the Phænomena that can rationally
‘ be expected in the Dissolution of a
‘ Stone in the Bladder. This Dissolu-
‘ tion has been effected (under God)
‘ by the Use of Mrs. *Stephens’s* Medi-
‘ cines: And the whole Process has
‘ been safe; in nothing detrimental to
‘ the general State of my Health.

Now, besides Mrs. *Stephens’s* Medi-
cines, this Gentleman used also a good
Aperitive Syrup of Opening and Diu-
retic Plants, &c. of which, he says, he
took above two Gallons, besides a
Quart of the Syrup of Elder-berries, as
also, for constant Drink, a medicated
Ale, with Quicken-grass, Saxifrage,
Gravel-grass, Eringo-roots, Pelitory of
the Wall, Daucus-seeds, Root of *Mæ-*
um, Camomile Flowers, Juniper Ber-
ries, and Raifins.

*Medicines used
besides Mrs.
Stephens’s.*

Of the Calcarious Matter.

Here is a very good Regimen, and, no doubt, efficacious in cleansing the Urinary Passages, and bringing away small Stones, Gravel, or the like, which are small enough to pass. Now, the Question here is, Whether Stones were dissolved in his Bladder? there is nothing to favour that but the Flakes, Sediment, &c. If these are real Stone, then he had a Dissolution of a Stone in his Bladder; but if they are the Calx of the Medicines, then his Pain proceeded, as before, from Gravel and the Stones which were small enough to pass. If they are not the Calx of the Medicines, where did it all go to, for we find no Account of it else? But I believe we shall make it very clear, that this Matter is the very Calx, and nothing else, before we end this Enquiry.

*The same Kind
of white Parti-
cles in other
Patients.*

The same Similarity of this white Matter is also observed by Mr. Bolton, who compared, with Mr. Binford, Mr. Holland, and Mr. Armstrong, what was voided in the Urine of each, and they were so much alike, that, Mr.
Bolton

Bolton says, 'One would think this all came from the same Person.' And it is pretty plain *Dr. Hartley* then thought them Parts of Stone in this very Case; because upon an Objection then raised, that the Medicines produced them, he tells us he wrote to *Mr. Bolton*, desiring to know whether he had had any Return of his Complaints, and mentioned the foregoing Objections. But now very likely his Opinion may be altered; nor does it appear he had much to boast of in the Case of *Thomas Robinson, Esq;* notwithstanding the strong Smell of his Urine, and the copious Sediment he deposited; for after taking the Medicines three Months, he received neither Good nor Harm from their Use. What then must the Sediment be here?

I must not forget the ingenious Argument of *Mr. Machin* upon the Affair; he ask'd *Dr. Hartley*, what Proportion of calcarious Matter was in the Medicines? and, being told, he further ask'd, which Way it passed? It was answered, By Urine: From whence he concluded,

*Mr. Machin's
Argument.*

concluded, that since no calcarious Matter could be changed into animal Substance, it must be the same that is so often called dissolved Stone. This indeed is no great Wonder, when the Powders alone amount to so much as three Drachms in a Day, besides the Calx of the Soap in the Decoction, and the calcarious Matter of the Pills, which, taken in such large Quantities, may easily supply what appears to have been discharged every Day by those who take them.

I believe, No body will venture to affirm, that any Particles of these Medicines are nutritive of, or in any wise similar to any Particles of the human Body. If not, then besides the Alkaline Salt and Oil, there is an Abundance of what may be called an unalterable Solid in them, which is the Calx, tho' they be reduced to an impalpable Powder before they are taken. This Matter must either be discharged, or retained in the Body, when such Quantities are taken of it; and it appears from
Dr.

Dr. *Hartley's* Answer to Mr. *Machin*,
they are discharged by Urine. By Mr. *Morand's* † Experiment, in his Answer
to the first Question, *viz.* What Proof
is there that the Medicines enter the
Urine? And by some Observations of
Dr. *Hales*, where he says, ‘ We see in
‘ these Experiments what a Quantity of
‘ Lime there is incorporated into Soap-
‘ lees, which yet are as clear as fair
‘ Water, and this with the Lime of the
‘ Egg-shells taken in Substance, is a
‘ Fund sufficient to supply that Quan-
‘ tity of calcarious Matter which is
‘ voided by Mrs. *Stephens's* Patients,
‘ together with Sand, Gravel, Scales,
‘ and dissolving Parts of Stones.’

*Proved by
Mr. Morand.*

*From Dr.
Hales.*

In another Place this learned Author
says, ‘ Now, since there is so much Lime
‘ in Soap-lees and Mrs. *Stephens's* Pow-
‘ ders, it may well be ask'd, whence is
‘ it that Mrs. *Stephens's* Patients do not
‘ always void such calcarious Matter,
‘ while

† *Gem's Extr.* p. 21.

Of the Calcarious Matter.

' while they are taking the Medicines?
 ' Perhaps it may be, that while the
 ' Stones in the Bladder are in a dissolv-
 ' ing State, the dissolving Matter of
 ' them combining with the Calx of the
 ' Soap-lees and Egg-shells, may make
 ' too plentiful and gross a Combination
 ' of Matter to be sustained in the Urine
 ' consistent with its Transparency.

*A Combina-
 tion of the cal-
 carious Part
 of the Medi-
 cines probable.*

If from this last Observation, it is
 probable there may be a Combination of
 the Particles of the Calx in the Bladder,
 (than which nothing is more likely)
 such an Assesblance forming Flakes,
 Bits, &c. can be no great Credit to the
 Medicines, nor can they be said to act
 as a Dissolvent, that are subject to Con-
 cretion themselves.

But it is concluded by some, who
 made Experiments on Stones out of the
 Body, that they may be dissolved in the
 Body by these Medicines. Why should
 we not with more Right, think that,
 because calcarious Matter concretes out
 of the Body, it may combine in the
 Bladder?

Bladder? These Particles are stony Particles *sui generis*, and are subject to the same Powers of Cohesion with those of any other calculous Matter; and if they can combine grossly in the Bladder, and become too heavy to be sustained by the Urine, they may acquire fresh Particles every Hour, and become at last too bulky to be discharged, by the same Laws that *Calculi* do; and therefore I think it is a happy Thing to find them come away.

There is another plain Proof that *Another Proof.*
this is nothing but the Calx of the Medicines that comes away in the Urine, in the Case of Mr. *Armstrong*; who declares, That in twenty-four Hours after taking them, they chang'd his Water from a Redish high Colour, to a White Wheyish Hue, and deposited a white Sediment, and continued to do so most of the Time he took the Medicines regularly. That about the third Day thin White Flakes in a soft State began to come away, and continued more or less every Day for ten or twelve
2 Days;

Days; and then after two or three Days Interval came away larger Flakes, and harder than before.

Can it be imagin'd, that in twenty-four Hours this Change was occasioned by any Thing else than the Calx of the Medicines? We are sure he took them, and therefore certain there was Matter to produce that Sediment; but, can it be asserted with Decency or Discretion that a Stone was dissolved in twenty-four Hours? or that he had a White Stone in his Bladder, rather than one of any other Colour?

This Account shews too, that there was a Combination of the calcarious Matter, for about the third Day thin white Scales were discharged; this was, because the Supply was increased. These continued ten or twelve Days, and then upon an Interval of a few Days, the Flakes were larger and harder than before; this might happen for Want of proper Exercise for so long Time; and the calcarious Matter not
being

being light enough to be sustained by the Fluid, fell together, and upon the first occasional Action of the Patient, came off with the first Stream of Urine in larger Pieces. Besides, we find by the same Case, that the Calx may concrete into different Forms; for the Patient says, that sometimes there were chalky Pieces amongst these Flakes, some irregular, and some round, which would crumble easily between the Fingers.

Mr. *Naish* had this White Sediment on the first Day of his taking the Medicines, which continued all along. See his Case in the *View of the present Evidence.*

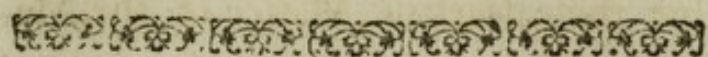
But, to conclude, the Experiment made in one of our Hospitals proves it undeniably: The Medicines were given to a Man who never had the Stone, nor any Symptoms like it, who, during the Time of his taking them, voided Flakes, Scales, Bits, Sediment, and all the Train of Forms the Calx of the Medicines

An undeniable Proof.

Medicines could produce. Sure the greatest Infidel must now be convinced, that the calcarious Matter of the Medicines alone produced these, and not any calculous Matter whatsoever.



Of



Of Experiments made on Human Calculi.

Altho' Experiments are of great Use in all Parts of natural Knowledge, and ought to be vigorously attempted, in order to come at what may conduce to the Benefit of Mankind, and to arrive at the Truth; and altho' it is a laudable Thing to be inclin'd to make Experiments, yet we ought not to be so fond of those we make, as to imagine they have proved all we wish for; or to draw such Conclusions from them, as may favour (or skreen any Defect in) what we cry up.

All the Experiments that have been made upon *Calculi* from time to time, with regard to Mrs. *Stephens's* Medicines, can amount to no more, than to shew that Soap is an Aperitive, and

*Experiments
serv'd only to
promote the
Sale of the
Medicines.*

a * Scourer of the Parts thro' which it passes; but before we were better informed by the only Experiment, opening Bodies after Death, they indeed tended greatly to encourage Mankind to an implicate Belief of their being able to dissolve the Stone in the Kidneys and Bladder; and serv'd to keep up and cherish these Hopes in such as were afflicted with that Disease, by being continually made and published, and consequently promoted the constant Sale of the Medicines.

*Of no Use out
of the Body to
prove the dis-
solving Power
of Medicines in
the Body.*

When we can draw an absolute Parallel between Stones in a Bladder or Kidneys, and Stones in a Glass or earthen Vessel.

When Soap, Soap-lees, medicated Urine, or any other *Menstruum* can remain and act upon a Stone in the Bladder or Kidneys, with the same Constancy and Force, and in every other
Cir-

* *Galen*, and many others since him, have told us the same Thing.

Circumstance, as in a Vessel of Earth, Glass, &c.

When the Sides of the Bladder can resist the Action of the Medicines, like those of a Phial.

When we can find saw'd Stones in the Bladder, and be able to brush them every Day at Pleasure.

When we can always command the *caustic* Salts of the Medicines imbib'd, and dissolv'd in the Juices of the Body, to be determined only to the urinary Passages, and not to circulate to any other Parts.

When we can boil Stones in the Bladder, and increase or diminish the Heat about them at Pleasure, *cum multis aliis*, &c. then Experiments may shew something; but as there are many Experiments made by several Authors, to shew a Lithontriptic Virtue in Acid Salts out of the Body, these made upon this Occasion, can only shew, at most,

that there may be such a Virtue in Alkalines also ; but cannot at all prove they dissolve Stones in Kidneys or Bladder.

*Opinions of
other Lithon-
triptics.*

As for Dissolvents for the Stone out of the Body, it appears from the Experiments of several Authors, that Acids are most powerful, which is, too, the Opinion of *Monf. Geoffroy*, whom we have cited above, concerning the harder Stones, and which is further confirmed by the Experiments of the ingenious *Dr. Rully*, * whose Book is just come to my Hands, and from whom I shall transcribe the following Summary of those made by him :

‘ Of the several Articles examined,
‘ the only absolute Dissolvent of the
‘ Stone is Spirit of Nitre ; the rest are
‘ rather Lithontriptics, of which the
‘ strongest in Efficacy is Spirit of Salt ;
‘ the next Soap-lees ; the next Lime-
‘ water,

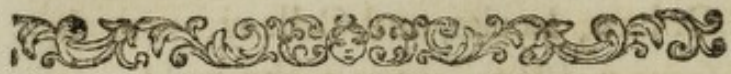
* *Account of some new Experiments on Joanna Stephens's Medicines*, p. 38.

‘ water, and probably the Juices of
‘ Onions, Leeks, and Cellary, may de-
‘ serve a Place among the milder Li-
‘ thontriptics.

Thus we find our Soap-Colation is
by Experiment even out of the Body,
no more than of the third Class of Me-
dicines thought capable of acting upon
Stones.

*Fallibility of
these Medi-
cines.*

We find also these Medicines, like all
other pretended infallible Things, falling
far short of their boasted Efficacy, and
are dwindled into mere Fallibility ; and
we must (I believe) confess, that our
soapy caustic Medicines require as ra-
tional and cautious an Application, as
any other *corrosive* Drug that is in prac-
tice. Which leads me to my next
Question, which is:



QUESTION III.

Are they Medicines that cannot produce any ill Effects in the Body, since they are taken in such large Quantities, and no Limits set to the Length of Time in which they may dissolve the Stone?

MAny and dangerous are the Evils, that may proceed from an empirical Exhibition of these Medicines. The first Disadvantage (I shall take Notice of, that may arise from taking them) is, that when the calcarious Matter does not come away, there is Danger of its concreting in the Bladder. This is proved in the foregoing Question; but, because I find Doctor *Rutty* denying that the calcarious Matter, voided by the Patients during the Use

*Dr. Rutty's
Opinion obvi-
ated.*

of Mrs. *Stephens's* Medicines, is the Calx of them, I must take the Liberty of viewing his Reasoning upon it.

He says, † 'The calcarious Matter, thus voided, differs from the Calx of the Medicines in two important Respects; (1.) That it is in a great measure volatile in the Fire, as are the different Stones of Animals, and those of a human Body; but the Calx of those Medicines is fixed in the Fire.'

Now, supposing this last to be the Case, then it is proved to be the very Calx of the Medicines, from Dr. *Hales's* Experiment; for he and Dr. *Hartley* put twelve Grains of the Sediment from the Urine of a Person taking them, into a new Tobacco Pipe, and kept it red hot for half an Hour, which (Dr. *Hales* says) was reduced to seven Grains. Here seven in twelve Grains are allowed to be Calx; for, he says, they may reasonably be thought the Calx of the Medicines.

I 4

What

† *Account of some new Exp. and Introd.* p. 4.

What became of the other five, or what they consisted of, we are not informed, except it is insinuated, that what was deficient, was the calculous Matter evaporated. But may we not suppose, that this Matter, which had circulated with the Fluids of the Body, might have retained some unctuous Moisture that cemented those Particles together, when it grew hard, tho' it had even lost its aqueous Vehicle, and was seemingly dry; and which half an Hour's fresh Calcination would cause to evaporate? and also, should we not allow for something wasted, by sticking to the Sides of the Pipe in so small a Quantity? Considering these Things, I believe we may as well impute the Loss of the five Grains to such Waste, and Evaporation of unctuous Matter, as to that of any Part of a true Calculus; and, I think, it would amount to an Absurdity in Judgment to imagine, that the Lime which has passed thro' the Body, should be exactly the same in all Respects with that which never was in it.

His

His * second Argument is, that he has found such calcarious Matter (voided during the Operation of these Medicines) to agree likewise with the Stone of the Bladder, as well as to differ from the Calx of these Medicines, in that it made an Ebullition peculiarly or chiefly with *Aq. Fortis*, and not with Vinegar, Spirit, nor Oil of Vitriol; whereas the Calx of the Medicines makes a strong Ebullition with Spirit and Oil of Vitriol, and even with Vinegar.

I would make Use of no other Argument to prove the calcarious Matter, voided by Mrs. *Stephens's* Patients, is the Calx of the Medicines, since it causes any Ebullition at all with *Aq. Fortis*; for tho' it makes no such Ebullition with weaker *Acids*, we see it does with a stronger. The Reason is very clear: Because the calcarious Matter of the Medicines has undergone Digestion, Ablution, and other Changes in the Body, whereby the *Alkaline* Quality (which should resist the Action of *Acids*)

* *Account, &c. p. 5.*

Acids out of the Body, is much lessened, and consequently can make no Ferment with the weaker Acids; whereas being put to *Aq. Fortis*, which is an exceeding strong Acid, whatever Alkaline Salts remain, will be acted upon by its exceeding Acid Quality, tho' not by weaker. Whereas there is no great Wonder, if the Calx of the Medicines (having undergone no Change, and abounding with fiery Particles) are capable of raising an Ebullition with the weakest of Acids. And tho' I never made the Experiment, I doubt much whether Lime, passing thro' several Ablutions of common Water, renewed at different Times, and suffered to dry, will ferment with weaker Acids, tho' it may with *Aq. Fortis*.

*Principles of
Stones in the
Bladder.*

From what has been said above, it fairly appears, that this is the Calx of the Medicines, and consequently if it is not discharged, it may concrete in the Bladder, each Particle being a Principle sufficient to receive the Addition of fresh ones, or of being glued to others by

by the Help of *Mucous*, or such like, Matter. As a Needle, * Straw, or any other extraneous Body may be a *Nucleus* to stony Matter in the Bladder, and even in the Stomachs, and other Parts of Animal Bodies.

We have the Opinion of an excellent *Venette's Opin-*
Author to strengthen this, who, after *nion.*
mentioning several Medicines capable
of doing Mischief in the Body by Con-
cretion, has these Words: † ‘ The
‘ same may be said of Egg-shells, which
‘ are truly Stones, and are form’d of
‘ like Principles, and which carry with
‘ them the Characters of Petrifica-
‘ tion. What Good then can be ex-
‘ pected

* Dr. Mead has a *Calculus* concreted about a Needle.

† J’en dis de mesme des Coquilles d’Oeufs, qui font des veritables Pierres faites par des principes semblables, et qui portent avec elles les caracteres de petrification. Ainsi que peut on esperer de favorable des toutes les Pierres pour detruire celles qui s’engenderent dans notre Corps? En verité on n’a pas assez examiné toutes ces matieres, et l’on donne souvent à yeux clos sur des remedes, qui au lieu d’avoir quelques vertues bienfaisantes, en ont non seulement d’inutiles, mais des malfaisantes & de fascheuses.

Venette Traité de Pierres, p. 267.

' pected of any Stones for destroying
 ' those that are bred in our Bodies?
 ' Certainly these Matters have not been
 ' well examined, and often Remedies
 ' are blindly confided in, which, in-
 ' stead of having any efficacious Vir-
 ' tues, are not only useles, but of very
 ' dangerous Consequence.

*Pleurifies
caused.*

May not the calcarious Matter, as it
 is unalterable as to its Solidity, in cir-
 culating with the Fluids, obstruct some
 of the minute *Capillaries*, and cause In-
 flammation, in either the Meninges of
 the Brain, Pleura, or any other deli-
 cate Membranes. Mr. *Wood* died of a
 Pleurify whilst taking the Medicines;
 and tho' he might have had one with-
 out, yet because the calcarious Matter
 may obstruct the Vessels of the Pleura,
 or because the caustic Salts might have
 caused the Inflammation, it is probable,
 they occasioned it.

*Vesications
caused.*

May not the caustic Salts, which are
 abundant in the Course of the Medi-
 cines, vesicate and ulcerate the Parts
 thro

thro' which they pass? Mr. *Holland* is said in the *View, &c.* to have died of an Erysipelatous Fever; but it is reported his Blood was rendered so caustic, as to have vesicated him all over. *Quere*, Whether Mrs. *Stephens* had no other Patients in the same Condition in *Bow-Lane*? If this be true, and nothing is more probable, since the caustic Salts are so abundant in the Medicines, this direful Effect must happen to some of those who take them, when they are determined to the Pores of the *Cutis*, as well as to the other Emunctories.

Where a Person has the Stone, and *Putridity* is of a putrid Habit of Body, will not these alkaline Medicines increase the Putrification, and cause a miserable Catastrophe?

Are not Ulcers daily increased in *Ulcers increas-* Kidneys, Bladder, Lungs, Liver, or *ed.* any other internal Part by the Use of those Medicines?

Profluv. sanguinis.

Should these Medicines be given to Women subject to a *Profluvium sanguinis*, would not the Mischief be increased?

Schirrus, Cancer Uteri.

In a *Schirrus*, or *Cancer Uteri* which have Symptoms that emulate those of the Stone, will the Medicines not hasten a miserable Death?

In Palsies.

Is it rational Practice to give caustic Medicines to a Man in a Palsy, as in the Case of *Symonds*? or to an asthmatical Patient, as to *Wood*?

Swell'd Legs and Body.

Mr. *Kettle* had his Body and Legs swell'd by the Medicines, which ceased upon his leaving them off. 'He took the Medicines about a Year, but not constantly, nor always in full Quantity; and says, Mrs. *Stephens's* Medicines have done me no Harm, only occasioned a Swelling in my Body and Legs; and since I left off taking them, the Swelling is gone off, and I am in the same State I was in before.'

Mr.

Mr. *Stanton* died suddenly during the *Sudden Death*.
use of the Medicines; and Mr. *Carteret* of an Apoplexy, sometime after
he thought himself cured.

The Pains they suffer, who take the Medicines are exceeding great, as appears by Mr. *Bolton's* Case, and many others; and the Quantity of mucous Matter torn away by their Acrimony, cannot but be of the utmost Danger. Dr. *Kirkpatrick* in his Letters says,
Pains caused by the Medicines.
' That he voided much *Mucus*; that
' the pellucid *Mucus* gives the greatest
' Pain: that he imagines this to be no
' more than the *Mucus* secreted from
' the Glands of the Bladder and Ure-
' thra contrived by provident Nature to
' sheath the acrimonious Salts of the
' Urine, that they might not offend
' the tender Parts, thro' which they
' pass; and that the alkaline medica-
' ted Urine is so very deterfive, as to
' wear off and scour away this *Mucus*,
' leaving the Bladder and Urethra ex-
' ceeding bare.

If

*Destruction of
the Tone of
the Bladder.*

If Nature's Intent (in placing Glands in the Bladder, or any other Membranes of the Body) was to secrete a Juice for guarding their Coats from any thing Acrimonious; whatever is capable of abrading that Guard, and leaving the Glands and Mouths of the Vessels bare, must be destructive to the Constitution of the Part; and a Continuation of this Abrasion for a long time, must be still worse and worse, and at last render the Part insensible, by destroying its Tone: Mr. *Gardiner's* Bladder appeared entirely relaxed.

Now when a Person dies of a Disease not immediately affecting the Bladder, it is naturally in a contracted State, and so are those of the Beasts commonly killed by Butchers. This I have often observed both in human Bodies, and Brutes; the Reason may not be disagreeable here.

*How accounted
for.*

The natural State of muscular Fibres is to be in strong Tension, in-
much

much that if there happens a Solution of their Continuity, the divided Fibres are strongly retracted from each other: Now as the Fibres of the *Detrusor* Muscle arise on the fore Part from the *prostate* Gland, and spreading over the Bottom of the Bladder, terminate in the same under the *Vesiculæ Seminales*; it has no Attachment as other Muscles have to keep them tense, and therefore they are contracted in their natural State; having no other Cause for their Extension, but the gradual Repletion of the Bladder by the Increase of Urine from the Ureters; their Contraction in order to expell the Urine being voluntary, and spontaneous in their State of Rest.

For this Reason, I have had a good deal of Trouble to inflate a human Bladder, which could not be done but by slow Degrees; and thus have I seen Boys rowling and pressing the Bladders of Sheep and Oxen, and inflating them by turns, in order to increase their Distension: Hence we see, in a natural emp-

ty State the Bladder is contracted and shrunk up, and in a preternatural or morbid State it may become more *rigid*, or more *relax'd*, according to the Differences of its being affected by different Causes.

Pains increas'd.

Mrs. *Matthews* took the Medicines ten Weeks, and had her Pains increas'd, was forced to leave them off, having the same Complaints remain, as before she took them.

Colick.

The Medicines brought on the Colick on Mr. *Daubuz*.

Body and Legs swelled.

Mr. *Windsor's* Body and Legs swelled very much, and he was exceeding *Lethargic* and otherwise indisposed after taking the Medicines for some time, which made him lay them aside.

Different other Diseases, in which the Medicines ought not to be administered.

In a Word, I believe it must be allow'd, these Medicines should not be exhibited to Persons subject to *vomiting* or *spitting* of Blood, *Fluor albus*, *Prolapsus Uteri*, *Ani*, or *Ruptures* of

any Kind, *Consumption, Asthma, Dysentery, Hæmorrhoids, Colics* of any Kind, or any *Inflammatory* Diseases, or to those subject to *Lethargy* or *comatous* Disorders.

Hence it appears that these, like all other Medicines, ought to be subject to a rational and judicious Administration; and it is not deny'd but they may do service in some gravelly Complaints; nor is it to be doubted, but their Abuse may be of the most dangerous Consequence, as well as that of any other acrimonious Drug whatsoever: And because I am willing to shew, that Dr. *Hartley* was once of this Opinion, I have here set down his Observation upon the Case of Mr. *Lamplugh*, who had his Stomach offended very much, and his Pain encreased by the Medicines; his Case was uncertain, not being opened when he died.

A rational Use of them best.

‘ That the Medicines were hurtful
‘ in this Case I think very probable, this
‘ being his own Judgment, and that
‘ of those about him. But as it is not

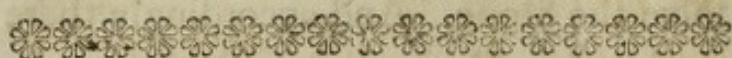
Dr. Hartley's former Opinion

' certain what his Case was, one can
 ' draw no certain Conclusion from it,
 ' to prove the general Hurtfulness of
 ' Mrs. *Stephens's* Medicines in the Stone
 ' and Gravel. And if we should sup-
 ' pose that Mr. *Lamplugh* had a Stone
 ' in the Kidneys, yet he might have
 ' also some Particularity in his Case or
 ' Constitution, which made the Medi-
 ' cines in the Manner and Dose di-
 ' rected, hurtful to him. Just as there
 ' are particular Persons, who either
 ' cannot take *Bark*, *Mercury*, and *O-*
 ' *pium* at all, or only in certain Doses
 ' and Preparations. And indeed it is
 ' much to be lamented, that Mrs. *Ste-*
 ' *phens's* Medicines are not known to
 ' Physicians, that so they might be ad-
 ' justed by them to the Circumstan-
 ' ces of each Patient.

Now they are known, such Stress is
 laid upon taking the full Dose regu-
 larly and incessantly, in the Form which
 is daily exhibited to every one that can
 purchase them, that there seems but
 little Encouragement to make any Al-
 tera-

teration in them with an Intent to dissolve the Stone. And accordingly there are but few Examples of Physicians attempting to adjust them to the different Circumstances of any Patient; for that was done long enough ago, as may be seen in the different Forms through which the Egg-shells, and other Ingredients in Mrs. *Stephens's* Medicines have pass'd: but I cannot find that any Physician ever pronounced them *Lithontripticum ad Calculos tam in Renibus, quam in Vesica solvendos efficax*, 'tis added, *hic in Anglia nuper inventum*, but Dr. *Hartley*.

The Medicines indeed were not lately, but long ago found out, and every Effect they could produce, which we shall now proceed to prove: It must be only their *safe* and *effectual dissolving* Power that is discover'd; which turns out as capricious and slippery as *Crude Mercury* between one's Fingers; no sooner found than lost again.



QUESTION IV.

Were these Medicines never used before for any of the same Intentions?

Mrs. Stephens said to be the Inventress of these Medicines

TH O' Mrs. Stephens is called **Inventrix horum Remediorum*, the Inventress of these Medicines; and tho' I think there is a strong Insinuation† of her having by degrees found out the Calcination of the Egg-shells, and the Addition of Soap to the Powders, in the following Words; yet it shall presently appear, that every Ingredient made use of in the Composition of them, has been used by very early Physicians; and has been commonly practised and recommended by so many since *Avicenna's* Time, that to recite a History of them

* *Dissertatio de Lithon.* p. 5, 6. per Dr. Hartley.

† Vide *Supplement to the View of Pres. Evid.*

them would take up more Room than the Design of this short Treatise can admit of. It is said, 'About twenty Years ago, she accidentally met with a Receipt for the Stone, consisting of Egg-shells dried in an Oven and powder'd; which she administered to several Persons. After some Trials made with this, she *began* to burn the Egg-shells, and burnt them sometimes to Blackness only; sometimes till this Blackness was chang'd into a grey Colour, which approached so much the nearer to a perfect Whiteness, as they were continued longer in the Fire, or its Heat more intense. Her Method at this Time was, to give of the Powder of Egg shells thus burnt, black or grey, as much as would lie upon a Shilling, three times a Day; and it appeared to her that this Powder was more efficacious in proportion as the Egg-shells were more burnt: but finding that it caused often a great Costiveness, she added a small Quantity of Soap occasionally to each Dose, with a View both to prevent this

' Inconvenience, and also to forward the
 ' Dissolution of the Stone; and thus she
 ' continued giving the burnt Egg-shells
 ' with a small Quantity of Soap for
 ' several Years, curing gravelly Com-
 ' plaints thereby, and sometimes dissol-
 ' ving Stones in the Bladder, &c. Up-
 ' on this she gave the Powder and Soap
 ' in still greater Quantities, and found
 ' them attended with proportionably
 ' greater Success.

All People are not vers'd in the Hi-
 story of the *Materia Medica*; such as
 are not, may be easily persuaded to be-
 lieve her the Inventress of these Medi-
 cines from the above Account; for she
 is here introduced as one rationally im-
 proving them and increasing their Vir-
 tues by the Calcination of the Shells, and
 the Addition of Soap; as if neither were
 ever thought of before. It is really sur-
 prising that such a Notion could be in-
 troduced and credited.

At the same Rate one might (in turn-
 ing over Authors) find many Histories

of Stones dissolved in the Bladder, by other Medicines, as much commended as these, and no Doubt altogether as efficacious; some of which †*Lazar. Riverius* has collected, and a vast Number collected by *Burnet* *; any of which, as they are scarce to be met with now-a-days in common Practice, might be made Secrets of, and their Virtues cry'd up in the same Manner. However, that these should have gained so much upon the Faith of the World is the more strange, as they have not ceased to be prescribed by most Authors all along, and even are to be found in our latest *Pharmacopœia's*.

In order to make this plain, I will first set down what *Mrs. Stephens's* Medicines consist of, and then shew several *Formulæ* from Authors of the same Ingredients used always for the same Intentions.

Her Medicines are a Powder, a Decoction, and Pills.

The

† *Praxeos, l. 4. c. 1.*

* *Theaur. Medicinæ,*

*The Ingredi-
ents of Mrs.
Stephens's
Medicines.*

The Powder consists of Egg-shells and Snails, both calcin'd, six Parts of the former to one of the latter.

The Decoction is made, by boiling a Ball made of Soap, Swines Cresses burnt to a Blackness, and Honey, with green Camomile, Camomile-flowers, sweet Fennel, Parsley and Burdock-leaves, of each one Ounce, in Water.

The Pills are made of equal Quantities of Snails calcin'd, wild Carrot-seeds, Burdock-seeds, Ashen-keys, Hips and Haws, all burnt to a Blackness; a large Spoonful of this to four Ounces of *Alicant* Soap, beaten with Honey to bring it to a Consistence, is the Mass for the Pills.

*Avicenna's
Electuary of
Ashes, or cal-
cin'd Simples.*

As to the Powder, many of the Ancients prescribed calcin'd Powders for the Stone, by which Operation they thought their diuretic Quality was increased; * *Avicenna* has an Electuary of cal-

* Et de his quæ sunt fortia, est Cinis Ovorum Gallinæ, postquam evacuata sunt à Pullis. R

calcin'd Ingredients, amongst which are
Egg-shells so prepared, and of which
he makes this particular Remark. 'The
' *Ashes* of Egg-shells after the Chickens
' are hatch'd are the strongest.'

The following is the Electuary :

' Take of calcin'd (or Ashes of)
' Glass, of Scorpions Ashes, of the Roots
' of *Nabathean* Coleworts, of a Hare,
' of Sponge-stone, of Goats Blood dry'd
' and powder'd, the *Ashes* of Egg-
' shells which have been forsaken by
' the Chickens, and of the Stone called
' *Lapis Judaicus*, &c. of each equal
' Parts; and of *Parsley*, *wild Carrots*,
' Gum-Arabic, and *Marsh-mallow*-
Seeds ;

℞. Cineris Vitri, & cineris Scorpionum, & cineris
radicum caulium Nabati, & cineris leporis, & lapi-
dis spongiæ, & sanguinis Hirci, exsiccati & contriti, &
cineris corticum Ovi, de quo Pullus egressus est, & La-
pidis Judaici, &c. partes equales ; & Petroselinii, Dauci,
Pulegii, Gummi Arabici, & feminis Altheæ ; confici-
atur cum Melle, &c. et hoc est conveniens ei q. in
Vesica est. *Avic.* lib. iii. Fen. xviii. Trac. i. c. xix.

seeds: Make it up with *Honey*, and this is convenient for whatever is in the Bladder.

Calcin'd *Egg-shells* have been handed down for Ages as Specifics for the Stone, which is to be seen in many Authors; a few will sufficiently shew it, wherefore take the following *Recipe's*.

‡ *Fernelius* says: Some Medicines rub off and lessen the Surfaces of *Calculi*, such as, burnt Glass, *Egg-shells*, &c.

* *Riverius* has the following *Recipe*.

Take the Ashes of burnt *Egg-shells* from half a Drachm to one Drachm; give in white Wine, it powerfully expels the Stone sticking in the urinary Passages. ‡ *Fuller*

‡ Nonnulla etiam, asperitate sua, calculi summam faciem abstergunt & attritu comminuant, ut, Vitrum ustum, Ovorum testæ, &c.

Math. Med. L. v. c. xxv.

* ℞. Cineris cort. ovar. adustor. an. ℥ss. ad ℥i. exhibitus cum vino albo potenter expellit calculum, in urinæ meatibus hærentem.

Prax. lib. xiv. c. 1. de Calcul. Renum.

‡ Fuller has a number of Receipts for the same Intentions, compos'd both of *Egg-shells* and *Soap* in different Forms for both external as well as internal Application.

In his *Emulsiō Diuretica*, the *Testæ Ovorum supra Porphyritim alcoholisator*. are an Ingredient amongst other Diureticks.

His *Pillul. Diureticae*, Diuretic Pills, have for their Basis, calcin'd *Egg-shells* half a Dram, added to a Scruple of Camphire, and half a Scruple of *Cantharides*.

His *Pilul. Testaceæ*, Testaceous Pills, are thus : ‘ Take fresh calcin'd *Egg-shells* one Dram, Cream of Tartar and *Sal Prunellæ*, of each eighteen Grains, Salt of Tartar and Salt of Amber, of each twelve Grains, Oil of Anise-seed, three Drops. They powerfully promote Urine. His

‡ *Pharmac. Extemp.* edit. 5. Lond. MDCCXIV. 12mo.

His *Pulvis Diureticus*, Diuretic Powder.

‘ Take of the *Lapis Prunell.* one
 ‘ Dram; *Egg-shells* calcin’d, two Scru-
 ‘ ples; Oil of *Amber*, one Scruple;
 ‘ white *Sugar*, two Drams; mix them.

He refers the Reader to the Virtues of his Diuretic Julep, where he says of them both: It dissolves and expells tartarous *Salts*, and collected *Mucus* or Slime; it cools, opens, and cleanses the Reins and Ureters.

The *Egg-shells* are also the Basis of his Compound Powder of *Filipendula*.

‘ Take of *Filipendula* and *Anise-*
 ‘ *seeds*, each one Dram; *Egg-shells*, two
 ‘ Drams; make a Powder of the whole.

All these plainly shew the *Egg-shells* to have been constantly in extemporaneous Prescription both calcin’d, and only levigated to a fine Powder: We shall now shew that Soap was as frequently

quently used extemporaneously for the same Intentions, from this last Author.

The Nephritic Plaster.

‘ Take Opium in Powder two Drams;
‘ soft *Soap*, an Ounce ; Oil of Juniper,
‘ half a Dram ; make a Plaster and
‘ lay it to the Loins.

Castile Soap is a principal Ingredient in his *Enema saponacea*, and also the wild Carrot Seeds.

The Soap Clyster.

‘ Take Mallow-Leaves, golden Rod;
‘ of each one Handful ; Juniper Ber-
‘ ries, Bay Berries, wild *Garrot Seeds*,
‘ and Parsly Seeds, of each two Drams;
‘ boil them in a sufficient Quantity of
‘ Water to strain off twelve Ounces ;
‘ dissolve in it half an Ounce of *Castile*
‘ *Soap*, an Ounce of Oil of Camomile,
‘ half an Ounce of Oil of Anise-seeds,
‘ and two Ounces of Syrup of Violets.

He says, it lubricates the Urinary Passages, expells Gravel, and therefore
it

it is contrived for such as have calculous Complaints, being found of great use.

His *Pilulæ Ictericæ*, tho' assign'd only to the use of People in the *Jaundice*, yet as it is given by way of *Deobstruent*; we shall therefore insert it; to shew a Difference in its Medication.

‘ Take Cream of Tartar and Co-
 ‘ chineal, of each forty-five Grains;
 ‘ *Venice Soap*, two Drams; make them
 ‘ up into fifty-four Pills.

But this Author has the *Soap* with other Ingredients as a Nephritic, which he calls his *Pilulæ Nephriticæ*, Nephritic Pills.

‘ Take Powder of prepared *Milli-*
 ‘ *pedes*, crude Sal Armoniac, and *Venice*
 ‘ *Soap*, of each two Drams; *Gum*
 ‘ *Hed.* one Dram and a half; Saffron-
 ‘ Oil of Juniper, sixteen Drops; and
 ‘ as much as is sufficient of *Venice Tur-*
 ‘ *pentine* to make up the Mass. He
 ‘ says, these were much used by a cer-
 ‘ tain

Lithontriptic Medicines.

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tain Practitioner, and greatly esteem-
ed for promoting Urine, and the Dis-
charge of Slime and Gravel.

Another Form of Pills, is his *Pillu-
læ smegmaticæ*.

Take *Venice* Soap, two Drams ;
Oil of Anise-feed, eight Drops ; make
them up into twenty-four Pills.

They purge the Urinary Passages,
and are good against the *Dysury* and
Jaundice.

This Recipe was approved of, and
brought in amongst the *Formulæ* of the
Pharmacopœia Pauperum for the use of
Hospitals, with some Amendment, by
the learned Compilers of that Book,
thus :

Take *Venice* Soap, one Ounce ;
Oil of Anise-seeds, thirty two Drops ;
beat them in a Mass, and make ten
Pills out of every Dram, to be roll'd
up in the Powder of Crabs-Eyes.

L

These

These are very Efficacious in all Obstructions of the *Urinary* Passages ; and also so very Detergent, as to be of great Service in any Foulness of the *Viscera*, so that they are not only of good Service in the *Stone* and *Gravel*, but in the Jaundice and Asthma's, in the most obstinate Cases of which they are ordered with the greatest Certainty of Success : They are to be taken from three to five, two or three times a Day; the Patient using proper Diluters at the same Time.

We might add many more, but these may suffice for our Purpose here. Now since we prove Mrs. *Stephens* is not the *Inventrix horum Remediorum*, it may be, perhaps, pretended that she shew'd the World how to use Soap in larger Quantities than was attempted before. To this we shall answer, that even that is not new ; for *Soap* was given in *Scotland* to People afflicted with Complaints of the Kidneys and Bladder, in as large Quantities as she has given it,
long

long before hers were made publick. I have been inform'd of this by one Mr. *Hunter* a Surgeon who was taking the learn'd Professor *Monro's* Course of Operations, and that when he was treating of Lithotomy, he made a long Harangue in praise of *Soap*; upon which he was then making Experiments at *Edinburgh*. This young Gentleman, upon his Return to *Glasgow*, gave the *Soap* to one troubled with the *Stone*; made up into Pills with *Syr. de Althea*, to the Quantity of above an Ounce in a Day; which he pursued for a long Time; and that after the Publication of those Medicines called Mrs. *Stephens's*, this Patient as well as several others had attempted taking them; but not being able to endure the Pain they suffer'd from them, were obliged to return to the *Soap* made up as before.

As to the other Ingredients, as the *Hips, Haws, wild Carrot-seeds, Burdock-seeds, and Asken Keys*, almost all Botanic Writers speak of them as

Diuretics; however, the Opinions of two or three Compilers will prove it.

Of the *Haws*, Mr. Ray in his **Catalogus Plantarum Angliæ*, &c. says,
 ‘ The distilled Water, and the dryed
 ‘ Powder, are generally said to be of
 ‘ Service in *calculous* Disorders.

Mr. Dale † in his *Pharmacologia* refers, for these, to the Virtues of the Seeds of the Medlar-Tree: where he says, ‘ They are greatly commended for
 ‘ breaking and expelling the *Stone*.
 And Quincy, in his *Dispensatory*, says,
 ‘ Tho’ there is but little Use made of
 ‘ them in Medicine, yet they have ob-
 ‘ tained a Name for being very *Diu-*
 ‘ *retic*, and powerful Expellers of the
 ‘ *Stone* and *Gravel*.’ And their Flowers are an Ingredient in Dr. Radcliff’s Nephritick Water.

As

* Verum tum aqua distillata, tum siccati pulvis calculosis prodesse traditur magno consensu.

† Semina commendantur summopere ad calculum atterendum, & expellendum.

As to the *Hips*, they are mentioned also by † *Dale* (who copied the Words of *Ray*) as having a Lithontriptic Virtue.

The wild Carrot Seeds are praised for the same Use by *Ray* †, given in a medicated Drink, for which he quotes *Charlton* in *lib. de Lithiasi*.

These Seeds have been of this Class in the most early Writers. *Avicenna*, as we have said before, has them in his *Asbes Eleſtuary*; and they were so esteem'd, as to have a particular *Recipe* form'd of them, and bearing their Name, in *Fuller's Pharmacopœia Extemporanea*, called,

Cerevisia de Dauco, *.

Take wild Carrot Seeds six Ounces ;
L 3 Raifins

† Fructus vi Lithontriptica maximoperè commendantur, in qua tamen excellunt exempti arilli.

† Semen Dauçi in Cerevisia leptomera infusum, & bibitum, ad stranguriam, calculum renum, & vesicæ, miris laudibus efferent e modernis.

* ℞. Sem. Dauçi Sylv. ℥vi. Passul. ℥xii. f. sacc. pro cong. iv.

Renes & ureteres emungit; arenulas pellit; & calculi generationem præcavet.

Raisins twelve Ounces ; put them into a Bagg for four Gallons of Ale.

They cleanse the Ureters, and expel Gravel, preventing the Generation of fresh *Calculi*.

The *Ashen Keys*, or Seeds, are commended by *Schroder*, and several other Authors, as having the same Virtues. And as to the *Burdock*-seeds, *Dale* has these * Words concerning them, ‘ This
‘ Seed is counted a remarkable Lithon-
‘ triptic.

And, *lastly*, the *Snails-shells* are an Ingredient in the *Pulvis contra Calculum* of *Quincy*, which besides consists of Crabs-Eyes and Pearls prepared, Millipedes, and Salt of Amber.

Thus I have given sufficient Testimony, that not one Ingredient of these Medicines is of Mrs. *Stephens's* Invention,

* Insigne censetur semen, Lithontripticum.

tion, but that they have been handed down, and ordered for gravelly Complaints of both Kidneys and Bladder Time out of Mind : We may therefore conclude, that they have, in some of the particular Prescriptions of Physicians, been collected into the *Receipt-books* of Families, and so dropt into this Gentlewoman's Hands. However, to shew that this is not altogether a Surmise, I present the Reader with a few *Receipts* for the Stone, of very near Relation to those of Mrs. *Stephens*, from two Receipt Books ; the first is called *Natura Exenterata* ; or, *Nature unbowelled* : Printed in *London* 1655. to which is prefixed a Print with this Inscription under it.

*The most Illustrious and most Excellent
Lady Alathea Talbot, &c. Countess
of Arundel and Surrey, and
the first Countess of England.*

And the other is called, *A Choice
Manual, or Rare and Select Secrets in
Physick and Surgery*, collected and

L 4

practised

practised by the Right Honourable the Countess of *Kent*, late deceased. The 9th Edition, printed at *London*, 1657.

In the former of these we have the following Receipts.

Pag. 127. *For the Stone in the Reins or Bladder.*

1. Take the Shell of an Egg where a Chicken hath been hatched, beaten to Powder; this drunk with White Wine, breaketh the Stone in both Places †.

Pag. 281. *For the Stone.*

2. Take of Penny-Royal and Mal-
lows, of each a Handful, Anise-seeds a
Penyworth, boil them in a Quart of
white Wine, till it come to a Pint, and
put to it Half an *Egg shell* powdered, a
little *Castile* Soap, with three or four
Corns of Pepper in gros, of Nutmeg
and Sugar two Spoonfuls, and put it
into your Mouth, and drink the Wine
in the Morning. The Party that made
2 this

† This is from *Avicenn.*

this Note did avoid above four hundred Stones in one Fortnight.

Probatum est.

Pag. 324. *For the Stone.*

3. Take *Snails*, and lay the Mouths downward upon a Tile-Sheard, which lyeth upon *Coals*, take out the Snails when they are well dried, and beat the Shells to Powder, drink it in white Wine, and, about two Hours after, shave some white *Castile* Soap into warm white Wine, whereof will arise a Froth, which will fall again to the Bottom of the Cup, then shake it together, and it will rise again, and drink it presently. The Powder maketh it to *break*, and the Drink with Soap maketh it to *slip*.

4. *Dr. Smith's Medicine for stopping of the Urine, and to assuage the extreme Heat thereof.*

Take a Pint of Rhenish Wine, and with the Yolks of two new-laid Eggs make a Caudle, relish it with Sugar and Nutmeg to your best Content, then dissolve therein Half an Ounce of white
Castile

Castile Soap, and drink that Caudle at three Draughts warm, in the Morning one, when you go to Bed the second, the next Morning the third; by this you shall find great Ease, both of the Stopping and Pain, and great Comfort, without any Loathsomness at all.

5. *For the stopping of the Urine, either by the Stone or Strangury.*

Make clear Possiet-Ale with White Wine or Ale, seethe in the Possiet-Ale a great Handful of *Parsley* shread, and as much *Pellitory* of the Wall shread, and when it is sodden, scrape in a Quantity of *Castile* Soap, but let it not come on the Fire after the *Soap* is in; stir it together, and give it the Patient to drink when he is stopped, a Pint at a Time as warm as he can drink it, and anoint the Place grieved before a Fire with the Oil of *Roses*, or Oil of *Lilies*; and for Want of these, take *Sallad* Oil, dip a Cloth in the same Oil, and lay it warm to the Place grieved, and walk after it in your Chamber, if you can,

I and

and it will help in short Space, GOD willing.

Put in an Herb called *Grommel*, if you can get it.

You may use the aforeſaid Herbs in a thin Ale-bery, and put in a Piece of Butter after it is ſodden, and let not the Drink come on the Fire after the Butter or *Soap* is in it, for then it is binding; if you drink a *ſmall* Draught, it will not do ſo much good as a *great* Draught.

Pag. 341. *A Receipt for the ſtopping of the Urine.*

Take three Pints of *Hawſes*, and pick the Stalks and the Tops, take Half a Pint of red *Dog-berries*, and Half a Pint of *Cherry-ſtones*, take a Dozen of *Medlars*, bruife all theſe together, and being bruifed, put them into eight Pints of white Wine, then ſtop up all theſe together in an earthen Pot, and let them ſtand a Day and a Night, and every eight Hours ſtir them, and then ſtop them

them up again, and put it into an ordinary Still, and still that; this must be done about *Michaelmas* Time, and when the Party hath Need, let her take four Spoonfuls at a Time.

From the latter, *viz.* *The Choice Manual*, Pag. 134.

A Powder for the Stone.

Take *Haws* and *Hips*, of each a good Handful, *Ashen Keys* Half a Handful, three or four *Acorns*, the *Shells* of three new-laid *Eggs*, *Gromwel Seeds*, *Parsley Seeds*, of each half an Ounce, make all these into a fine Powder, and put thereto two Ounces of *Sugar-candy* beaten something small; take a Six-peny Weight of this *Powder* at a time in the Morning fasting, and drink not after it one Hour.



A N
A C C O U N T
O F T H E
D I S S E C T I O N S
O F

Some Bodies of Persons who died after
the Use of Mrs. *STEPHENS'S*
Medicines.



THE HISTORY OF THE
DISEASES

AN
ACCOUNT

OF THE
DISEASES

OF THE
THE USE OF MEDICINES
MEDICINES

BY
WILLIAM



CASE I.

The Case of Mr. Payne, Butler
to Mr. Baynes in Southamp-
ton-Row, near Bloomsbury-
square.*

‘ **H**E was subject to Pains in his
 ‘ Back, with Vomitings, for se-
 ‘ veral Years; and had also great Pain
 ‘ in making Water, with a sudden
 ‘ Stoppage, and violent Forcings to go
 ‘ to Stool; made Bloody Water upon
 ‘ riding or walking much, for four
 ‘ Years. Took Mrs. *Stephens's* Medi-
 ‘ cines for fifteen Months, upon the
 ‘ use of which his Water became foul
 ‘ at the Time of making, and let fall
 ‘ a heavy Sediment, which dry’d into
 ‘ a hard Substance, and had a slimy
 ‘ fetid

* A View of the present Evidence, &c. p. 9.

' fetid Matter in it. He voided feve-
 ' ral small Pieces of Stone in a soft
 ' State, and once a Stone as big as the
 ' End of his little Finger, (after hav-
 ' ing had violent Pains in his Back the
 ' preceding Night) which was so soft
 ' as to receive an Impression from the
 ' Fingers, in being taken up. He has
 ' now been perfectly well for near
 ' three Years, and is in the sixty-sixth
 ' Year of his Age. The large Stone
 ' became hard, and much less when it
 ' was dry'd.

' Here again the Medicines have been
 ' of eminent Service, and in a Way
 ' which does not at all favour a Stone-
 ' generating Quality in the Urine, but
 ' the Contrary. A Stone-generating
 ' Urine is not likely to bring a Stone
 ' from the Kidneys, or Bladder, but
 ' rather to detain it; nor is it pro-
 ' bable that Mr. *Payne* after having
 ' had the Symptoms of the Stone for
 ' four Years, should be first freed from
 ' these, and then continue so for near
 ' three Years, upon this Supposition.
 ' And

And the long time for which he took the Medicines, shews that they who have taken them for a less, cannot certainly conclude against the Efficacy of the Medicines, notwithstanding that they be not cured.

R E M A R K S.

BEfore we take any Notice of the Commentator's Sense of this Case, we must observe that it is of the highest Consequence in cases of this Nature, to have Accounts as well faithfully as minutely related; especially as all these Cases seem to be kinds of Invitations to the Publick, to come and feast plentifully upon these *Soap Entertainments*; and are the Facts upon which the Faith of the People is to be grounded.

There is, indeed, no Doubt to be made, but he took the Medicines fifteen Months; that a Sediment fell to the Bottom, which dry'd into a Mass; and that a slimy fetid Matter came away. As

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to

to the first, it would make more in favour of the Medicines if he had not taken them so long, since here are Stones, found in his Bladder when he died. The second is no great Wonder, there being Matter enough in the Medicines for a Sediment that would grow hard; and as to the last, he might have had an Ulcer in his Kidneys; but what is all this to the Matter in Hand, or how do these Things prove a Dissolution of the Stones? It may be answer'd: here were pieces of Stones in a soft State, and an entire solid Stone as big as the End of his little Finger voided. I confess this does not appear so clear to me as could be wish'd; for with regard to the Pieces, if they were soft, I cannot conceive how they could be voided in the Form of Pieces; for the Pressure of the Urethra ought to affect them, so as to spoil any particular Shape in them, that might entitle them to be thought pieces in that State. And as to the Stone, since there is but one mentioned in this History, I am inclined to believe, from what a Person of Credit has
declared

declared in a very public Manner, that the Doctor was not rightly inform'd concerning the Stone: for one Day when Mrs. *Stephens* visited Mr. *Payne*, who was in Bed, this Person says, he came into the Room, and had not been long there, before Mr. *Payne* reach'd out a Bason from under the Bed-clothes, in which he had made Water: The Person took the Bason from him, and found a common moderate Quantity of Urine, clean and clear, with one Stone in the Bottom of the Vessel. Before he declared any thing concerning the Stone, he ask'd Mr. *Payne* these Questions. ' Had you Pain in making this ' Water? Did it stop suddenly in your ' full Stream? What Sensation did you ' feel when you made it?' He was answered by Mr. *Payne*, that he felt nothing, and, had not made Water more easily and freely in his Life. Upon which he then told him, and Mrs. *Stephens*, there was a Stone, which he was amazed the Man should not have felt; shewed his Surprise, and went away. He says the Stone was hard, and of a

lightish Brown Colour. Now if this Stone differed in Colour and Consistence from what have been found in his Bladder when he dy'd, and as these so found differ'd not specifically from each other, who can help thinking the Doctor was not rightly inform'd of the Case; who has no doubt been candid in his Account of every thing within his own Knowledge. This seem'd to be far from a Stone in a soft State, yielding to the pressure of the Fingers when taken up; and indeed one so hard and large must have been felt in an *Urethra* of the greatest Diameter, except it was miraculously discharged.

It is said, he remained perfectly well for near three Years. This makes nothing in Favour of the Medicines, because, as we have already observed, there are many Instances of Intervals of Ease for several Years, between the Fits of the Stone, without the use of any Medicines; because they find unaccountable Receptacles to lie in, and give no more pain till they fall again upon
the

the Orifice. If Mr. *Payne's* Bladder appeared much relaxed upon opening his Body, it is no wonder, because the Medicines, taken constantly fifteen Months, were very capable of producing that Effect; and consequently no great Wonder he had Ease for some time at last.

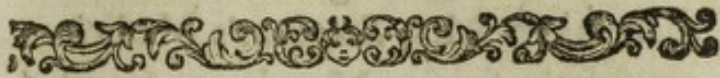
We cannot pass over the last Assertion of the Commentator, in his Remarks upon this Case; that 'the long
' Time for which he took the Medi-
' cines, shews, that they who have taken
' them for a less, cannot certainly con-
' clude against the Efficacy of the Me-
' dicines, notwithstanding they be not
' cured.' When this Case was published, the Man was alive; then indeed there was some Pretence for saying to any other Person taking the Medicines, You cannot expect to be cured sooner than Mr. *Payne*; being (as a Country Gentleman, a Favourer of the Medicines called him) a living Witness of their Virtues. Indeed so were several others, as *Carteret, Bolton, Gardiner,*

&c. altogether as responsible ; but however effectual the Testimony of living Persons may be in the Eye of the Law, yet in our Debate, none of these were qualified to bear Witness till they were dead. This is a kind of *Paradox*, but a great Truth, and an Exception to that old Proverb ; *Dead Men tell no Tales* : For here they are the greatest Tell-tales.



CASE

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CASE II.

R. SKRINE, Esq;†

(I had the following Account from his own Mouth, June 7, 1737. which I wrote down immediately after I left him.)

‘ **H**AD been afflicted with the Stone
‘ for nine Years. Such a Stop-
‘ page of Urine for a Year, that he was
‘ obliged to pass a leaden Probe every
‘ Day. Thought that he felt with this
‘ two small Stones that stopped the
‘ Urine at the Neck of the Bladder,
‘ and also a large one which he could
‘ not move. Had ulcerous stinking
‘ Matter in his Urine very often; great
‘ Irritation, Pain and Difficulty in mak-
‘ ing Water; bloody Water often, and
‘ violent

† See view of the present Evidence.

' violent Forcings to go to Stool. Had
 ' then taken Mrs. *Stephens's* Medicines
 ' constantly for five Months, and voided
 ' a very large Quantity of thick Sedi-
 ' ment, with some little Stones, which
 ' he called also Grit and Gravel, and
 ' said that two or three of them were
 ' as big as Pease ; and that they were
 ' all voided in a soft State. He had
 ' some Pains in his Sides, which he sup-
 ' posed owing to the moving of a
 ' Stone, but said he was vastly better
 ' than when he began the Medicines,
 ' could move about, and had hardly any
 ' Complaints.

' I waited upon Mr. *Skrine* again,
 ' *September 21, 1737* ; and then was
 ' inform'd by him, that he had a vio-
 ' lent Return of his Pain, and Diffi-
 ' culty in making Water about a Month
 ' before, with the Discharge of much
 ' Matter ; also another Return of the
 ' same Kind about a Week before ; but
 ' was better then. Had likewise had
 ' a Rash, to which he was always sub-
 ' ject at that Time of the Year.

' After

‘ After this he continued the Medi-
‘ cines till the beginning of the *Decem-*
‘ *ber* following, then left them off, and
‘ died about a Month from that time;
‘ growing, I believe, perpetually worse,
‘ both whilst he took them, and after
‘ he had left them off.

‘ His Body was open’d, and four Stones,
‘ each about the Size of a Chestnut found
‘ in the Bladder; a small one in the right
‘ Kidney, and an Ulcer in the left. The
‘ Stone of the Kidney seem’d of a po-
‘ rous spongy Nature, those of the
‘ Bladder were very compact, and
‘ had a few white Eminencies on
‘ their Surfaces; which were smooth
‘ and brown every where else. One of
‘ them was saw’d through, by which
‘ the external Parts appeared to be of
‘ a lighter Colour than the internal
‘ ones.

‘ That Mr. *Skrine* had an Ulcer in the
‘ left Kidney before he began the Medi-
‘ cines, is probable from the ulcerous
‘ stink.

' stinking Matter which he voided.
 ' And whoever considers all his Com-
 ' plaints, with the Causes of them,
 ' will think it doubtful whether or no
 ' the Medicines can with Justice be
 ' said to have done him any Harm.
 ' At first they appeared to be of great
 ' Service, and what happened after-
 ' wards might be owing to the natural
 ' Progress of his Case; and particularly
 ' of the Ulcer in his Kidney, or per-
 ' haps to some accidental Cold, Fever,
 ' &c. at least in some Measure. Whe-
 ' ther the Medicines had augmented
 ' or diminished the Stones in the Blad-
 ' der and Kidney, cannot be known
 ' by their Size when taken out, because
 ' one cannot tell how big they were
 ' when he began the Medicines. Nei-
 ' ther will the other Circumstances de-
 ' termine this. The white Eminencies
 ' might either be fresh Incrustations
 ' from the Stone-generating Urine, or
 ' Parts of the original Stones much
 ' changed, but not yet brought off by
 ' the Stone-dissolving one, according as
 ' other Evidences shall prove this or that
 ' Quality

Quality to be in it. And for the
same Reasons that Stones are some-
times smooth during their Increase in
natural Urine, they may be smooth
during their Increase or Decrease in
medicated Urine, which last we may
conceive to be perform'd by reverf-
ing the Steps of the natural Increase.
In like manner the brown Colour of
the Surfaces will not conclude againft
either Opinion; fupposing either to
be made probable by the other Cafes;
because brown Stones and Pieces have
been voided fometimes, tho' rarely,
in other Cafes. Befides which, it may
be that Mr. *Skrine's* Difcontinuance
of the Medicines for a Month before
he died, might fuffer the Stones to
grow smooth and brown, by fuffering
the Urine to return to its natural
State. And upon the whole one can-
not do better than to refer this doubt-
ful Cafe to the clearer Evidence of
the others, efpecially as he voided
much thick Sediment, with Grit and
Gravel in a foft State, as in the o-
thers: or if we do fuppose that these
Stones

Stones were not either augmented or diminished, still there can be no certain Conclusion drawn from thence, with relation to other Stones of a different Nature.

R E M A R K S.

HERE is the Case of a Gentleman who had suffered a great deal of Torture both from the Stone, and from an Ulcer in the Kidney, which probably he might have had before he took the Remedies. Supposing then that the Ulcer might have been first begun by the Attrition of a Stone, which the ulcerous stinking Matter seem'd to point out; certainly, in that Case, the Medicines in *puris naturalibus* were not calculated for him, being acrimonious enough from their caustic Quality to increase such an Ulceration. But if it should be argued, that it might prove a Cleanser of the Ulcer; it may be answered, That a perpetual Deterfivè would be an odd Application, and would act upon the Ulcer, as a perpetual

petual Blister would upon an Ulcer on the Surface of the Body. Hence it is plain, there was a Contra-indication to the Use of it in this Patient.

It appears from the above Account, that he had taken the Medicines five Months, ending *June 7. 1737*, and continued them till the *December* following, which is about 12 Months; and it is not denied but that he took them constantly, and therefore the Urine must have constantly been kept in an *alkaline* State: If it were not so, the Favourers of these Medicines would scarce have omitted to use their capital Argument here, of the Necessity of keeping it incessantly in that State; and if *Ninety-odd* Pounds-worth of the Medicines were sufficient to keep it so, (it appears he made Use of so much) why then were the Stones not dissolved? for it cannot here be said, I hope, that the Stones found in him at his Death could have been form'd between the Time of his having left off the Medicines, which was in the Be-
ginning

ginning of *December*, and the Time of his Death, which was on the 29th of the same Month.

Here is a Rock of Difficulties so high, as not to be easily surmounted. In order, however, to sooth them a little, the Commentator upon the Case concludes, that 'since at first the Medicines appeared to be of such Service to him, sure they could not with Justice be said to have done him any Harm.' Our Argument here is, whether they have done him any Good. I am not fond of adding any more to the above practical Observation touching that Point, and shall therefore proceed.

The Stone and Ulcer were certainly concomitant Causes of his Death; a Fever might be symptomatic of either, and therefore it matters not much whether he had Fever or Cold, to the Question in Hand, nor whether the Medicines had augmented or diminished the Stones, since they were found as big as Chestnuts at his Death: But if they were
diminished

diminished gradually by the Medicines during the Year's taking them, they must have been of an incredible Size at first, to be found so large after the Action of the Medicines upon them for a Year: And it is no unusual Thing to find compact Stones smooth, when there are several together in the Bladder, being polished by rubbing against each other; but when acted upon by the Medicines, it is (I think) not often presumed throughout the Number of † Cases, that the Surfaces are smooth in their Decrease, but that they are rather eroded or eaten into, as appears by the Cases of *Underwood* and *Symonds*. It is lucky enough, when a Stone found after the Death of the Person who has taken Mrs. *Stephens's* Medicines happens to be ragged, unequal or friable; then the Medicines have indeed acted upon the Stone, and it is produced as an Evidence; but here is an unlucky Set of Stones found smooth, and another Manner of Dissolution doubtfully introduced; viz. 'That as Stones are sometimes smooth during their In-

crease

† In the *Pres. Evid.*

crease in natural Urine, they may be
 ' smooth during their *Increase* or *De-*
 ' *crease* in medicated Urine, which last
 ' we may conceive, by reversing the
 ' Steps of the natural Increase.'

To be sure, it is much better to have
 form'd some Hypothesis, tho' never so
 obscure a one, to defend this unkind Case,
 than to sit down tacitely, and let it e-
 scape undressed, staring the World in the
 Face. The same Manner of *Decreasing*
ing might have been attributed to Mr.
Gardiner's Stones, which were all
 smooth and compact: But whether an
 eroding Medicine should chuse to act
 by Way of *Colliquation* upon the Sur-
 faces of four Stones in one Bladder,
 and nine or ten in another, so exactly
 nice, as not to leave the least Inequali-
 ty, is a Question that does not seem
 difficult to decide. Or supposing them
 to have been eroded into Inequalities by
 the Medicines, is it plausible that those
 eroded Parts should be so neatly filled
 up, as to hide any Signs of being acted
 upon, in the Time from leaving off the
 Medicines,

Medicines, to his Death? I am afraid this is something too precise to happen, as well as the smooth *Decrease*; for if the Stone-generating Urine had begun to deposite fresh Particles upon such eroded Stones, I believe, as such Particles could not have a Power of placing themselves, they might have as well adhered to the Eminencies, as sunk into the Hollows to fill them up particularly, and no where else; and the Stones must have remained unequal in some Places, notwithstanding the Addition of Particles.

As to the white Eminencies or brown Surfaces, they signify not much to the Purpose. It is not deny'd but the Medicines abound with calcarious Matter, and might have deposited those white Particles or Eminences upon their brown Surfaces; nor is the brown Colour any thing rare; for we see those of Mr. *Gardiner* so too, and all alike.

At last it is concluded, That 'if we
' do suppose these Stones were neither
N ' augmented

‘ augmented nor diminished, still there
‘ can be no certain Conclusion drawn
‘ from thence, with Relation to other
‘ Stones of a different Nature.’ If the
Stones were not increased, which is the
most favourable Conjecture that can be
made in this Case, then all that can be
presumed is, that the Urine medicated
by the Medicines, has not a *Stone-*
generating Quality, or that they have
prevented that Quality in the Urine,
and at least kept them in the same State:
But, is this all that is promised for the
Medicines? But, on the other Hand, if
the Stones were not diminished, may
we not certainly conclude, that the Me-
dicines have not perform’d what was
expected from them? And indeed here
seems to be a Concession of this Con-
clusion, but with some Reserve, that is,
‘ That there can be no certain Conclu-
‘ sion with relation to other Stones of a
‘ different Nature.’ As if he had said,
‘ Tho’ these Stones could not be dissolv’d
by the Medicines, yet others may; but,
as this is no more than a conjectural,
and a very slender Defence, nothing
more

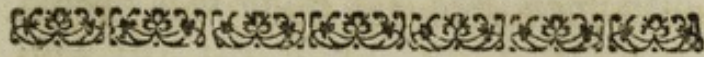
more need be said to it. As for the *Grit*, or *small Stones*, *Sediment*, &c. voided by Mr. *Skrine*, or any other, it is before granted in general, that any thing of a Diameter small enough to pass the *Ureters*, or *Urethra*, may by a proper Use of *Diureticks* be evacuated. Examples of this are frequent: I have known an intimate Friend, who, by getting drunk with *Sherry*, found in his Chamber-pot in the Morning much Gravel and Slime, with several Stones as large as Pease, which gave him great Pain in coming away. The Case of the old Woman shews the same; but this is so common, as not to be worth taking Notice of here, as making nothing for a dissolving Power in the Medicines.

Here is a Case full of Certainty. It is certain Mr. *Skrine* took Mrs. *Stephens's* Medicines for about a Year, and consequently his Urine was kept in an *alkaline* State. It is certain at his Death Stones were found in his Bladder, &c. and as certain they were in

him all along. How then shall any one call it a doubtful Case? No, it cannot be doubtful; let us rather with greater Reason reverse the Sentence of the Commentator upon it, where he says, 'One cannot do better, than to refer this doubtful Case to the clearer Evidence of others, &c. and say: One cannot do better than refer other doubtful Cases, to the clearer Evidence of this.



CASE



CASE III.

† Of Mr. THOMAS.

‘ HE had the usual Symptoms of a
‘ Stone in the Bladder, and be-
‘ gan Mrs. *Stephens’s* Medicines in
‘ *September* last, being about 75 Years
‘ old.

‘ *October* the 8th, Mr. *Hawkins* ex-
‘ amin’d him, and found a Stone in
‘ the Bladder, which he told Mr. *Tho-*
‘ *mas* he believed to be a large one.
‘ Upon first taking the Medicines, Mr.
‘ *Thomas’s* Water deposited much hea-
‘ vy Sediment, which dry’d into a stony
‘ Substance : Sometime after he voided
‘ soft white Scales in great Quan-
‘ tities, with Grit and Slime, which
‘ I saw. His Pains were great at
‘ this Time ; They continued ; he
‘ N 3 ‘ lost

† *View of the pres. Evid.*

' lost his Appetite, grew feverish, and
 ' died *Jan.* 20. His Body was open'd,
 ' and a Stone taken out of the Bladder.
 ' This Stone *Dr. Shaw* and *Mr. Haw-*
 ' *kings* saw, *Jan.* 30. I saw *Dr. Shaw*
 ' that Evening, and took down from
 ' his Mouth the following Words re-
 ' lating to the Appearance of the Stone.

' The Stone was light, white on the
 ' Outside, a great Part of it covered
 ' with a cretaceous Coat, which broke
 ' off in Flakes with great Ease, perfect-
 ' ly like to those before voided, as ap-
 ' peared by comparing them. The
 ' Stone would, to any indifferent Per-
 ' son, plainly appear as if acted upon
 ' by a Solvent, so as to have greatly di-
 ' minished its Bulk ; the inner Part of
 ' the Stone was redish, and harder than
 ' the external, when tried by a Knife.
 ' There were two Bulgings, which rose
 ' pretty high above the Stone, and
 ' which appeared to be less acted upon
 ' by the Solvent than the other Parts.
 ' The Stone was not covered equally
 ' with the same Coat, but what cover'd
 ' one

‘ one Part, appeared to have been taken
‘ off in others.

‘ The next Day I saw Mr. *Hawkins*,
‘ and took down from his Mouth the
‘ following Words relating to the Ap-
‘ pearance of the Stone.

‘ He saw a Stone weighing nearly
‘ two Ounces, as Mrs. *Thomas* said ;
‘ the Surface was of a whitish Colour,
‘ and in Part covered with a Matter
‘ that had all the Appearance of the soft
‘ Shells that had before come away in
‘ Mr. *Thomas's* Water. This Matter
‘ was very soft, and ready to fall off
‘ and crumble upon the least Touch.
‘ By these Appearances, he says, that he
‘ should imagine that the Stone had
‘ been larger, and that this soft Matter
‘ seem'd to be ready to fall off in a
‘ little Time. The Part of the Stone
‘ not covered with this scaly Matter,
‘ appeared, when scrap'd with a Knife,
‘ of a rusty Iron Colour, and considerab-
‘ ly hard.

' I believe no Body could have seen
 ' the prodigious Quantities of white
 ' Scales voided by Mr. *Thomas* soon
 ' after he began the Medicines, without
 ' being immediately reduced to this
 ' Dilemma, that the Medicines must
 ' either dissolve, or generate the Stone.
 ' Now, surely the last Supposition is as
 ' difficult to the Imagination, (if that
 ' be allowed to have any Weight here)
 ' as the first, and in this Case, as well
 ' as others of the like Kind, there seem
 ' to be some Circumstances very unfa-
 ' vourable to it ; as that the same Urine
 ' must first incrust the Stone, and then
 ' bring off its own Incrustations in pro-
 ' digious Quantities.'

R E M A R K S.

IN this Case a few short Observations
 will be sufficient : As first, Because
 this Man took the Medicines near five
 Months, and yet when he is dead a
 Stone is found, it was very reasonable to
 expect some Defence of the *Efficacy* of
 the

the Medicines, rather than it should be thought point blank the Man died with a Stone undissolved in his Bladder. One Argument here of its having acted upon the Stone is, that the heavy Sediment dry'd into a Substance. This is explained elsewhere ; but we shall here say again, it is no great Wonder this Sediment of his Urine should grow hard, when its Moisture is exhal'd ; I believe, all calcarious Matter would do the same. But whatsoever the Sediment be, we may ask, Whence come the Incrustations of Chamber-pots, which are common, if constantly used, without being kept clean? This cannot certainly demonstrate the Dissolution of a Stone. Urine will, of itself, deposite in Chamber-pots such concreting Matter, which cannot be ascribed to the Efficacy of a Medicine, none being administer'd. No Body therefore will deny that all calcarious Matter will do the same.

The Commentator says, he saw them himself : No doubt but he did, and
2 firmly

firmly thought them Stone, and would have the World think so too. The Stone is said to have been partly covered with a cretaceous Coat which broke off in Flakes, perfectly like those he voided before. This is not at all to be wonder'd at, and is the most convincing Reason to prove, that the *Calx* of the Medicines produced them all; because the next Coat under that Incrustation was red and hard. And also, as to the Bulgings, there appears nothing extraordinary in them; for a Stone perfectly globular is seldom found in the Kidneys or Bladder; they being of different Forms, according to the fortuitous Combination of the petrific Particles, and the different Pressure or Resistance of the Bladder.

Is it not natural to believe, that a Stone in the Bladder may be *plastered* over by the calcareous Matter of the Medicines, since it is allowed such vast Quantities must pass by Urine, and prov'd before that they make a gross Combination in the Bladder? 'Tis thus
they

they form Flakes, Bits, &c. which have amused the World, and encouraged the Sale of such vast Quantities of these *excruciating* Remedies; and thus every indifferent rational Person must think, whilst others may lay hold of any Thing to favour a Notion of the solvent Power of the Medicines; even Bulgings, Inequalities, and many other Things, which are not only apparent upon every Stone cut out of the Bladder, but also upon every Pebble we meet in the Way.

Every Taker of them has these white Sediments, &c. brown Pieces being acknowledged very rare by Dr. *Hartley* (See the Case of Mr. *Skrine*) to have been voided; and if the Quantities were (as the Doctor expresses it) *vast Quantities*, it is no Wonder if many Coats were wasted by the Medicines; But it is said before, That only 'what covered one Part, appeared to have been taken off in others.' I believe it is here rather meant, that only Part of the same Coat was eroded off, than
that

Remarks on the Case

that the Matter was translated from one Part to another. To conclude this Case, and to extricate the Doctor out of the Dilemma he thinks the white Flakes produce in this Case, whether he thinks the Medicines Stone-generators or no, we must here declare, that our Faith is, They are *Sediment-generators, Flake-generators, &c.*



CASE

CASE IV.

†*The Case of Mr. SMITH, near
St. Albans.*

*The following Account is taken from a
Letter dated Feb. 4, 1738-9.*

‘ AS the Multitude of unhappy Suf-
‘ ferers, who have been relieved by
‘ Mrs. Stephens’s Medicines, first indu-
‘ ced me to become her Patient, so the
‘ same prevailed with me to continue
‘ such for sixteen Months. But it is my
‘ Misfortune, that notwithstanding I
‘ have punctually persued the Rules and
‘ Medicines which she enjoined me, the
‘ same Symptoms which preceded my
‘ Compliance with her Orders, continued
‘ during the Use of her Medicines ;
‘ nor have I found any Benefit from
‘ that Length of time, I so careful-
‘ ly followed her Prescriptions.

‘ I am still attended with great Pains
‘ in the Loins, a Weight and Pressure
‘ in

† *Vide View of Pres. Evid.*

‘ in the Bottom of the Belly, Heat of
 ‘ Urine, frequent Motions to make
 ‘ Water, and as frequently interrupted;
 ‘ oftentimes a too frequent Propensity
 ‘ to Stool, and upon the least unusual
 ‘ Exercise either of walking or riding,
 ‘ I am subject to bloody Water. When
 ‘ I first took the Medicines I voided
 ‘ several seeming partial Surfaces of a
 ‘ Stone.

‘ It appears also by this Gentleman’s
 ‘ Letter to Mrs. *Stephens*, that his Wa-
 ‘ ter had often a thick white Sediment,
 ‘ and it is probable that some part of
 ‘ this might be Stone under an impal-
 ‘ pable Form, provided the dissolving
 ‘ Power of the medicated Urine shall
 ‘ appear from other Evidences. A real
 ‘ Dissolvent must require a different
 ‘ Time in different Cases, and one can-
 ‘ not tell where to fix the precise Li-
 ‘ mits; so as to say, that because a
 ‘ Medicine has not dissolved the Stone
 ‘ entirely within a certain Time, it has
 ‘ therefore had no Effect at all.

REMARKS.

REMARKS.

HERE is a Gentleman who with the greatest Diligence and Exactness took Mrs. *Stephens's* Medicines for sixteen Months, and found himself in as bad a Condition on the last Day, as he was at first; from whence one would imagine no Man could say any more of the Medicines by way of Observation, than that they did not answer the End in him, for which they were given, and consequently were not to be vindicated here: and yet here is a Vindication attempted, because he seems to have had often a thick white Sediment in his Urine; some part of which it is presumed, might be Stone in an impalpable Form. These white Particles are indeed often the best Handle of the Argument in Favour of the Medicines; 'tis very lucky, the Composition has always something to produce; But was the Patient the better for that? His Letter shews he was not; and because here are sixteen Months use of

I

them

them in vain, why 'tis said, one cannot tell where to fix the precise Limits as to the Time in which the Medicines may perform their Work in dissolving a Stone. The same Excuse would be as availing, if he had taken them seven Years, and was not cured. Sixteen Months are an Apprenticeship to be confin'd to, in taking such a Heap of nauseous Stuff, upon an Uncertainty; and tho' all his Grievs and Complaints still remained, yet 'tis presum'd 'one cannot say, that because a Medicine has not dissolved the Stone entirely within a certain Time, it has therefore had no Effect at all.' Indeed the Gentleman was still alive, and therefore one could not peep into his Bladder when these *Excuses* were made; but one would think from seeing him in his dismal Case, and hearing his own Declaration of himself after he had taken them so long a Time, that the Effect could not be much in Favour of these Medicines; or if the Effect was more than afterwards appeared, what did it signify to the poor Gentleman, whose Distress was still

still the same? and what Right is there for making an Excuse for the Medicines? But when we find them so excused in Mr. *Skrine's* Case, I wonder the less at it in Mr. *Smith's*.

However, the Insignificancy of such supposed Effect of the Medicines upon the Stone in this Gentleman's Bladder will appear by reading the following Letter from Dr. *Cotton* of Saint *Albans*, to Dr. *Mead*, who was a Witness to the opening of Mr. *Smith's* Body, and who has given a most accurate Account of the State of the Organs of Urine, and of a Stone (weighing only one Scruple less than *six Ounces*) found in his Bladder.

To Dr. MEAD.

S I R,

I Was favoured with yours, and as
 it is uncertain when I can come
 to Town, I have sent you the Stone;
 but the Relations expressing a great
 Value for it, I must beg the Favour,
 when you have sufficiently inspected
 it,

‘ it, that you’d be so good to return
 ‘ it, directed for me at Mr. *Shewel’s* a
 ‘ Distiller on *Snow-Hill*.

‘ I have sent you an Abstract of Mr.
 ‘ *Smith’s* Case; having only mention-
 ‘ ed what related to his taking Mrs.
 ‘ *Stephens’s* Medicines, and a few ge-
 ‘ neral Circumstances besides, which I
 ‘ imagine to contain all that is necessa-
 ‘ ry for your Purpose; but if a more
 ‘ particular Account is required, I am
 ‘ capable of furnishing you with sever-
 ‘ al other Occurrences, having taken
 ‘ down Notes of his Case for two or
 ‘ three Years past.

‘ I am inform’d, that great Pains are
 ‘ taken by the Favourers of Mrs. *Ste-*
 ‘ *phens’s* Medicines to stifle all Circum-
 ‘ stances that seem to make against
 ‘ the Efficacy of her Compositions, par-
 ‘ ticularly I am told, that Mrs. *Ste-*
 ‘ *phens’s* Friends deny that the late Mr.
 ‘ *Arthur Gardiner* pursued his Course
 ‘ till a little before his Death. I am
 ‘ surpris’d that this Report is handed
 ‘ about

‘ about with such Industry, because I
‘ cannot imagine that there has been
‘ the least Grounds for obtruding such
‘ *Mistakes* on the Publick. I was very
‘ well acquainted with this Patient, and
‘ upon the frequent Interviews which we
‘ have had together, I always under-
‘ stood by his Discourses, that Mr.
‘ *Gardiner* had *all along*, or with very
‘ small *Intermission*, persisted in Mrs.
‘ *Stephens’s* Medicines from the time
‘ of his first Application to her, to the
‘ last Conversation which we had upon
‘ this Subject; and last Summer in
‘ particular, I have been repeated times
‘ an Eye-Witness of his taking Mrs.
‘ *Stephens’s Pills*. When I have in-
‘ terrogated him why he pursued so
‘ nauseous a Medicine, at a Time that
‘ he was satisfied he was perfectly cured;
‘ his Reply was to this Purpose, that
‘ Mrs. *Stephens* had advised him to con-
‘ tinue the use of her Medicines to pre-
‘ vent further Complaints. Perhaps it
‘ may not be amiss to mention, that
‘ some Days ago a Clergyman of my
‘ Acquaintance sollicitated of me this, and

Remarks on the Case

‘ Mr. *Smith*’s Case, which I believe he
 ‘ design’d for Mr. *Nourse* the Surgeon,
 ‘ who it seems opened Mr. *Gardiner*
 ‘ and found several Stones in his Blad-
 ‘ der, &c. I am

Your very obedient

Humble Servant,

H. COTTON.

N. B. The Clergyman mentioned above, is Dr. *Rumney*, Vicar of *St. Stephens*, *St. Alban*’s, to whom when in Town were sent, by Dr. *Cotton*, the Case of Mr. *Smith*, (with the several Papers relating to Mr. *Gardiner*) which were read before the *Royal Society*. Those of the latter you have in his Case; and as that of Mr. *Smith* was sent by the Doctor to Dr. *Mead*, and differs not from that sent to Dr. *Rumney*, inserting it once will be sufficient, which is as follows.

Mr.

Mr. Smith's Case, by Dr. Cotton.

MR. *Smith*, a Gentleman aged 52, for several Years past hath been subject to calculous Complaints, and formerly voided many Stones, which were supposed to be Renal.

About three Years ago he had the common Symptoms that intimate a Stone in the Bladder. Hearing of Mrs *Stephens*, he apply'd to her, and strictly persued her Medicines a Year and four Months, with only the Intermission of one Fortnight, as the Patient hath often assured me.

At the Expiration of the sixteen Months his Urine grew very Bloody, and his Pains were increased. Whereupon he desisted from the further Prosecution of this Course; and by indulging plentifully in Oleaginous Medicines, his Symptoms abated of their Severity, and the Urine was no longer stain'd

with Blood, he continuing tolerable easy for six Months.

But about *Midsummer* 1740, several of his Symptoms recurred with their usual Violence, *viz.* frequent Propensity to Urine, rendering but a very small Quantity at a Time, with great Heat and Pain. To which were joined a *Tenesmus* and Sense of weight in the Bladder, upon turning in his Bed, or coming down Stairs. The Urine was of a pale Colour, with a tough *Gelatinous* Matter at the Bottom of the Chamber-Pot, and little Fragments of Stony Concretions. He every now and then complain'd of Sickness, attended with Vomitings of a Bilious Matter, ill Taste in his Mouth, and his Bowels greatly distended with Wind. He also complained sometimes of a Stupor about the Loins, and a Pain darting into his right Kidney. His Urine appeared deficient in Quantity, and during Sleep it flowed from him involuntarily.

July

July following he was search'd by a Surgeon of Note, who with great Difficulty introduced the Catheter into the Bladder, and declared he could find no Stone.

September ensuing he was again attempted to be search'd, but the Pain and Effusion of Blood that accompanied the Attempt, obliged the Surgeons to desist.

Feb. 1740-41, he had Recourse to the Nostrums of a Female Physician (Mrs. *Gaylard*) who pretended she was possess'd of the late Dr. *Robinson's* Medicine for dissolving the Stone, and that Mrs. *Stephens's* was all an Imposture.

He was easier some time. *Aug.* 3. he was a third Time essay'd to be search'd, but the same Difficulties occurred as before, and the Catheter could not be introduced.

October last, his Symptoms returned with greater Severity than ever, and the Woman's Medicines were laid aside.

Towards the Conclusion of the Year the Symptoms were more exasperated, his Flesh wasted, his Vomitings became more frequent, and his Appetite quite decay'd, &c. *January* 19. he expired.

The next Day the Body was open'd. All the *Viscera* appeared sound, except the Organs of Urine which were affected as follows :

The right Kidney was greatly distended beyond its usual Capacity. Its Cavity contain'd a large Quantity of Blood, Urine, and Grit ; the *Papillæ* also were full of a gritty Substance.

The left Kindney was distended in a different Manner ; on the external Membrane were scatter'd up and down several *Hydatides* of various Magnitudes, the

the Substance of the Kidney itself was much thinner than the former: Upon opening it, we observed it whitish and polish'd; the *Papillæ* and *Infundibula* were larger than those of the right.

Its Cavity was clear of Blood and Grit.

The Ureters were much enlarg'd, and their Passage free. On the left Side of the Bladder, immediately under the *Os Pubis*, there was lodged a large Stone, which was shap'd somewhat like a Pear, with its Apex lying at the Bulb of the *Urethra*, and its Basis to the Insertion of the *Ureter* of the same Side.

The Stone immediately upon its Extraction weighed *six Ounces* wanting one Scruple.

CASE



CASE V.

Of Mr. BOLTON †.

SIR,

‘ **T**Owards the latter Part of my
 ‘ Life, when in my Fiftieth
 ‘ Year, about 1720, I was sore pain’d
 ‘ with the Stone, until I voided a large
 ‘ Stone; at several Times since about a
 ‘ Dozen; Part came away after a little
 ‘ Riding, and then I made Water like
 ‘ Coffee: But I imagine one of the
 ‘ largest might stay behind; for in 1735
 ‘ I began to be greatly afflicted, could
 ‘ not endure to ride, or bear a Coach:
 ‘ When I have been a making Water, it
 ‘ often stopped on a sudden, causing
 ‘ much Pain; and no Person in the
 ‘ Country could give Relief, tho’ I took
 ‘ many odd Things. Reading the Pa-
 ‘ pers, I observ’d some Specifics for the
 ‘ Stone were advertis’d, one a Powder,
 ‘ the

† See *View of the present Evidence.*

‘ the other a Liquid. I got them, and
‘ try’d each; but was not able to go
‘ thro’ with either of them; being of a
‘ forcing Nature, increased my Pain:
‘ Then was advised to smooth palliating
‘ Medicines, yet Pain still continued,
‘ and excessive, made me begin to think
‘ of coming up to *London* to be cut, if
‘ it might be safely done at my Age.
‘ At that Time the News inform’d us,
‘ that the Bishop of *Bath* and *Wells*, and
‘ others, were cured by taking Mrs.
‘ *Stephens’s* Medicines; I was then more
‘ inclinable to come. When I set out,
‘ my Thoughts were, to undergo the
‘ manual Operation, and had wrote to
‘ Mr. *Chefelden* about it. When I ar-
‘ rived in *London*, and consulted with
‘ some Friends, it was thought, as I
‘ was in my 68th Year, the safest was
‘ to take Mrs. *Stephens’s* Medicines:
‘ And accordingly, on the 18th of *July*
‘ 1737, I began with them, taking
‘ three Powders, and three half Pints of
‘ Liquid every Day. What Effect, and
‘ how they did operate, you will see
‘ by the following Diary, which I kept

' as exactly as I could, considering the
 ' Pain I had by Times; which yet
 ' prompted me to keep strictly to the
 ' Medicines; believing, that by doing
 ' so, I should the sooner be made easy,
 ' and took the Liquid four times a-Day
 ' for some Weeks.

As it would be needless to transcribe every Word of the Diary precisely, and indeed a very dry Entertainment to the Reader, being chiefly an Information of the continual *Pain* he had during the whole Process of the Medicines; I shall only make an Abstract of the Diary, whereby the Reader will see in a little Compass how he suffered by them, and be able to judge of their Value.

He began to take the Medicines on *July* 18. 1737. which consisted of
 ' Three Powders, and three half Pints
 ' of a Liquid three times a-Day; and
 ' was in such great Pain, all along to
 ' to the 31. that it made him send to
 ' Mrs. *Stephens*, who answered, he
 ' must have Patience, and begin to try
 ' four

‘ four half Pints a-Day; which he did
 ‘ accordingly, together with the three
 ‘ Powders from *August* 1. the Urine
 ‘ being sometimes foul with *Slime* or
 ‘ *Mucus*, and sometimes clear, with
 ‘ *Great* or *Grievous* Pain all along to
 ‘ the 14.’ And then he has these
 Words :

‘ Above are twenty-eight Days, in
 ‘ which Time the Medicines took
 ‘ *little* Effect, and *much* Pain al-
 ‘ most every Day.

He went on with *grievous* and *cruel*
 Pain till the 21. when it was *very grie-*
vous, so *intolerable*, he sent for Mrs.
Stephens to acquaint her, he was not
 able to *endure*: She said, he must
 have *Patience*, he should in a little
 Time be easier; and might take an
Opiate to make him rest in the Night,
 and forbear to take the fourth half Pint,
 supposing it might be too hard upon
 him.

He

He went on however, calling his Pain sometimes *great and grievous*, sometimes *violent*, sometimes *very great*, sometimes *much*, and continued to have *Pain* more or less; and about the 23^d of *September* he has these Words.

‘ Having for above a Week past made
 ‘ clear Water, and with much
 ‘ Pain, and nothing coming away,
 ‘ made me begin to think of leav-
 ‘ ing off the Medicines; yet I was
 ‘ sure the Cure was not finished:
 ‘ and having a Doctor who hap-
 ‘ pen’d to be here, then advis’d
 ‘ me to take them a Fortnight
 ‘ longer; so I continued to go on.’

In short, he still goes on to take the Medicines, voiding sometimes *Bits*, sometimes no *Bits* with *Pain* at Times, all along to the 26th of *November*; began to forbear the Medicines on the 27th, and says he only took two Bottles after this Day; and concludes this *Diary* in these Words: ‘ 28th I walk’d a-
 ‘ broad as far as the Custom-house,
 ‘ having

‘ having confin’d myself for twenty
‘ Weeks, taking the Medicines regu-
‘ larly, without stirring out of Doors.

P O S T S C R I P T.

S I R,

‘ You may please to observe, I have
‘ had great Pain from the Stone, and
‘ the Medicines Operation, but now
‘ being entirely free from any, may be
‘ compared to a Woman in Travail, is
‘ forgotten, and do believe myself now
‘ to be cured of the Stone, having no
‘ Symptoms of that Kind. Thanks to
‘ Friends for Advice, and *Laus Deo.*

‘ *I am, &c.*

‘ FRAN. BOLTON.

R E M A R K S.

I Cannot but think the Observation very
just, whosoever has made it, from
this Gentleman’s Account of himself,
that ’tis much better to submit to the
Operation, than to bear so much *Pain*,
even an Hundreth Part of his *cruel*
Pain.

Pain. The Operation is perform'd in a few Minutes, whereby the Patient is rid of the Stone, or Stones of the Bladder : If the Constitution is good, and the Operation well perform'd, the Patient is in no very great Danger ; and a Life may be prolonged of a Person serviceable in his Country, and that in a small Time : Whereas here is a Gentleman who lies under one continued Scene of *Torment* and *Misery*, from *July* 18, to *November* 28, before his Ease is compleat ; and no sooner fancies himself cur'd, but he is, in a trifling Time after, dead, and Stones found in his Bladder.

Pernicious Ease ! whose Conditions are so hard, whose Reward is of so short a Date. It is like a Tyrant's granting to let a poor Slave live a Year or two, after he has suffered to be broil'd four Months. Is so short a Life worth purchasing at so dear a Rate ? and would not a six Minutes Operation be more eligible ? If you were to die, 'tis better before, than so soon after, a four Months

Months Rack ; if you recover, you are freed from your Grief and Complaints, and enjoy Life like other Men.

What Effects would any rational and impartial Man attribute to this constant Irritation of the Bladder for so long a Time? would he not grant, that such *caustic* Salts, as are capable of tearing the *Mucous Matter* that he voided so much of, from the Parts Nature designed it to guard, were at length capable of destroying the Tone of that Part, and of wearing it out by such a constant and tedious Use of them? And would he not allow, that the Ease that at last was obtained, must be from a Loss of Sensation in the Coats of the Bladder; since the same Medicines, still continued, no longer caused these painful Sensations, tho' as capable of producing the same Effects as before, and Stones still remaining in the Bladder?

Dr. *Hartley* writes to Mr. *Bolton*, upon some Objections made to him concerning the Bits of Stone voided by him,

P

and

and others, to have a particular Account sent him, whether he had any Return of his Complaints, and received an Answer, dated *February 9. 1738-9*, wherein, after he has expatiated on the great Service the Publication of the Medicines would be to the World, goes on to shew more particularly how he had been cur'd from what he suffered, and such like : After which he has this particular Passage.

‘ Formerly, about a Dozen Years
 ‘ since, I was much troubled with the
 ‘ Stone Pain, and took Medicines which
 ‘ helped me to void several I have now
 ‘ in a little Box, but never perceived
 ‘ any Thing come away like these Bits,
 ‘ but were entire Stones, like a Pea or
 ‘ Bean, or such Things. *Mr. Binford*
 ‘ of *Exeter*, and *Mr. Holland* at the
 ‘ *Tower*, both took the Medicines at
 ‘ the same Time I did ; they each came
 ‘ to shew me what came from them,
 ‘ and to compare with me. I observed
 ‘ that the Operation was the very same
 ‘ with them, having just such Bits as I
 ‘ had,

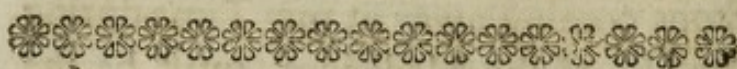
had, and at last a larger hard Stone,
which was called the Kernel. They
were so much alike, that one would
think they all came from the same
Person. The Bits are perfect Stone,
only soft at coming away; but laid on
a Paper they soon dry to be perceived
what they are, &c. &c. &c.

My Reason for transcribing this Part
of Mr. Bolton's Letter is, to shew, that
I think it very odd, there should appear
no Difference at all in the Effects of the
Medicines upon these three Persons, but
that the Bits were so much alike, one
would think they all came from the
same Person. This Exactness and Uni-
formity of Shape, Colour and Consisten-
cy in these Bits, as well in other Pati-
ents as in these three People, would
make one suspect that a Combination
of the calcarious Parts of the Medicines,
with part of the mucous Matter of the
Bladder, or their own Oil, might form
these Bits of Paste, called *Stones*, in a
soft State, being as capable of drying
P 2 into

into a hard Mass when carefully laid upon a Paper for that Purpose, as Bits of Stone, if not more so. And as to what is called a *Kernel* here, it is no less particular that each should have a *Kernel* of the same Sort. Now, supposing each had voided a hard Stone, what Rarity is in that? Mr. *Bolton* tells you, he voided several by the Help of other Medicines, before he took those of Mrs. *Stephens*. But why are they called *Kernels*, why not *Little Stones*? We may as well count every little Stone voided by any one a *Kernel*, because that Term seems to give the greater Force to the Notion of the Bits of supposed Stone. Mr. *Gardiner's*, Mr. *Stanton's*, &c. Stones, were all *Kernels* at this Rate too. This is indeed a Doctrine the most comforting and amusing that could be suggested for encouraging the Continuance of the Medicines with greater Chearfulness and Resolution. I dare believe, whoever takes them, as prescrib'd, will not often want soft Bits, or Sediment that dries into a Mass, which being thought Part
of

of a dissolved Stone, to be sure a small Stone coming away at any Time during the Use of the Medicines, must be the *Kernel*.

In a Word, and to sum up the Whole of the Case, this Gentleman took the Medicines with great Exactness, for the Time mentioned before, attended with inexpressible *Agonies* all the Time, fancied himself cured, and is since dead, having two Stones found in his Bladder; so that whatever the favourable Effects be (that are thought by some to make for the Medicines) produced by the Use of them, Time and the Inspection of the Patient's Bladder only can certify the Truth of their Efficacy or Inefficacy.



CASE VI.

*Of Mr. UNDERWOOD, at the
White-Lion Tavern in White-
Chappel *.*

‘ **H**E was afflicted with the Stone
‘ **H** in the Bladder several Years,
‘ had much Pain in making Water,
‘ and a sudden Stoppage. Took Mrs.
‘ Stephens’s Medicines six Months, and
‘ brought away several Scales. He
‘ has left them off three Months, is in
‘ a very weak low State, and has the
‘ same Complaints.

Feb. 15. 1738-9.

*Addition to Mr. Underwood’s Case,
Page 204 ‡.*

‘ Mr. Underwood died *March 1st,*
1738-9. Mr. Sharp open’d him,
March

* *View of the Pref. Evid.*

‡ *Supplement to a View of the Present Evid. p. 63.*

‘ *March 2.* took out a Stone that had
‘ the Appearance of being very much
‘ wasted, most of the Shell being de-
‘ stroyed, and very much of the inter-
‘ nal Substance eaten into, so as in some
‘ Measure to resemble a carious Bone.
‘ There were no Pieces of Stone in the
‘ Bladder, which was in a very healthy
‘ State.

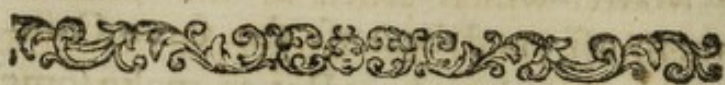
‘ It is to be observed, that Mr. *Un-*
‘ *derwood* did not fall into those violent
‘ Pains which were probably the Occa-
‘ sion of his Death, till some Time after
‘ he had left off the Medicines, that is,
‘ not till the Stone thus corroded, and
‘ in some Measure soften’d by the me-
‘ dicated Urine, had become hard again.
‘ There is a Hole quite thro’ the Stone
‘ on the Right-Hand, and the striated
‘ Appearances in these Figures are the
‘ several Coats of it.

R E M A R K S.

IN Mr. *Underwood's* Case what appears, is, that after taking the Medicines six Months in vain, he was oblig'd to leave them off; for it is allow'd, he was very Weak and Low, having the same Complaints still. The Reason of his having left them off is not said; therefore it may be probable that finding no Relief after six Months constantly taking them, he despair'd of Success, and so left them off; or perhaps his Stomach growing every Day weaker he could bear them no longer. In either Light the *Inefficacy* or *Disadvantage* of the Medicines is apparent in this Patient; for no Doubt can be made but he would have pursued the use of them, if his Hopes were in any Shape fulfill'd, and he was able.

Here it cannot be in the least pretended that the Stone found in him when he was open'd, had grown since his Disuse of the Medicines, because
it

it is not said he was cured before he left them off, and because the same Complaints continued. But to make some Amends, it is presumed the Stone was softened (in the Explanation of the Figure of it) by the use of the Medicines, and that when they were left off, it grew hard again; which caused violent Pains, which were probably the Occasion of his Death. Every one conversant in the Knowledge of the human Body, and its Diseases, knows that Paroxysms of the Stone are sometimes more Violent than at others; and therefore the violent Pains were but Symptoms of the Stone, which was the real Cause of his Death. We can in no wise be certain, that the Stone had been soften'd and had grown hard again from the Pain. One troubled with the Stone, is often easy from its different Changes of Situation, without any Remedy whatever, and without being made soft. And as to its Signs of being corroded, that may be refer'd to the Case of Mr. *Symonds*, where all that can be allowed to such an Appearance seems to be rationally accounted for.



CASE VII.

The Hon. EDW. CARTERET, Esq;
Post Master General †.

‘ HAVING been very much afflicted
 ‘ with the Stone and Gravel, and
 ‘ having by the best Means I could,
 ‘ endeavoured to get Relief: At length
 ‘ in the utmost of my Extremity, I
 ‘ was recommended to Mrs. *Stephens* ;
 ‘ and soon after taking her Medicines,
 ‘ I began to bring away in my Urine a
 ‘ whitish Powder, which when dry ap-
 ‘ peared to be what came from a Stone.
 ‘ This continued for some time, and in
 ‘ about two or three Months I found
 ‘ myself freed from a Pain I had felt at
 ‘ Times for several Years, on the right
 ‘ Side of the Bladder. And I am well
 ‘ assured it was a Stone or calculous
 ‘ Matter

† *View of the Present Evidence.*

‘ Matter which stuck to the Bladder.
‘ Besides this I had a loose Stone in the
‘ Bladder, which for several Months
‘ after, gave me extream Pain by its
‘ Forcing when I made Water; which
‘ at length came away in Pieces, al-
‘ most every time I made Water, for
‘ about nine Weeks following, until at
‘ last it came all away, as appear’d from
‘ my being freed from all manner of
‘ Pain. The Kernel of the Stone itself
‘ having come away, I thought my-
‘ self then entirely well, tho’ afterwards
‘ upon a Journey to *London*, some
‘ Stones fell from my Kidneys, which
‘ came away to the Number of seven
‘ at one Time, which made me pre-
‘ sume too far in discontinuing the
‘ Medicines in great Part, having little
‘ or no Pain; when a Stone, which
‘ had stuck in the *Ureters*, came down
‘ and stopped the Passage of the Urine,
‘ which occasioned a Suppression of it,
‘ and out of Fear of its not passing
‘ I had the Assistance of Mr. *Chefelden*;
‘ and, I thank God, I am free of any
‘ Pain, and have been so ever since.

‘ Mr.

‘ Mr. *Chefelden* made an Incision in-
 ‘ to the Urethra, and freed him from
 ‘ the Stone.

Dr. *Hartley* in his Supplement, &c.
 has this following Account of Stones
 taken out of the Bladder of the above
Edward Carteret Esq; but the Time of
 his Death is not mention’d ; *viz.*

‘ Fig. 7. represents a Stone taken
 ‘ from the Bladder of the Hon. *Ed-*
 ‘ *ward Carteret* Esq; Post Master Ge-
 ‘ ral, by Mr. *Sharp*; 8, 9, the same
 ‘ saw’d into two; 10, the Kernel of a-
 ‘ nother taken also from his Bladder;
 ‘ 11, part of its Shell. It may be sup-
 ‘ posed that these two Kernels were left
 ‘ in his Bladder when he discontinued
 ‘ the Medicines, about two Years before
 ‘ he died, and that the hard pale brown
 ‘ Shells were generated in that Inter-
 ‘ val by the incrusting Power of his
 ‘ Urine returned to its natural State.
 ‘ The half Kernel of Fig. 8, 9, are of a
 ‘ whitish grey Colour, as if acted upon
 ‘ by

‘ by the medicated Urine, and lie loose
‘ in the Shells. The Stone 10, 11,
‘ when whole, rattled upon being sha-
‘ ken, and was broken by an acciden-
‘ tal Fall upon a Stone Pavement.
‘ Mr. *Carteret* died of an Apoplectical
‘ Disorder.

R E M A R K S.

MR. *Carteret* has indeed drawn up his Case as well as could be expected, and the first Scene that presented after he began to take the Medicines, was that whitish Powder that came away in his Urine, (which appeared when dry to be what came from a Stone.) This whitish Powder we have shew'd already to be no more than the Calx of the Medicines for it is so often repeated under the Names of white Bits, Sediment, Powder, Flakes, that one would swear, no Man had ever any other than white Stones in the Kidneys or Bladder; and as for any small Stones that came away from time to time, there is nothing to be boasted of on that Account;

because if small enough to pass, every Day's Experience shews they do, without any Remedy at all. It appears, that after the Discharge of white Powder he had Pieces coming almost every time he made Water for about nine Weeks following. Now supposing he made Water five Times in twenty-four Hours, (and I believe a Man in his Case, may be said to go much oftener) and at each Time he might have voided four of those Pieces one Time with another; at this moderate Computation he must in nine Week have voided 1260 Pieces: In this Case the Stone to which they belong'd, must have been very considerable, or the Pieces less than the Bits so often mentioned elsewhere, and only imaginary. Such a Quantity of Pieces must have amounted to more Stones than he had from first to last, even together with those found in his Bladder after his Death.

Again says he, 'the Kernel came away, and I thought myself entirely well. But afterwards upon a Journey
' seven

‘seven at one Time came away.’ And again, another *Mr. Cheselden* cut out from his Urethra; these were also Kernels, or might as well be so accounted as the one that came by itself; but it is likely none of them would have had the Name of Kernels, if Pieces, Pits, Powder, &c. did not precede them. Indeed if they had been all Kernels, there were Pieces enough to cloth them, tho’ there were as many more, and make lusty Stones of them too.

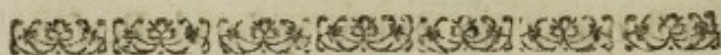
Mr. Carteret, it is said, died of an Apoplectical Disorder; however, two Stones were found in his Bladder; they were saw’d, and their *Nuclæi* are represented as being very rough, and indeed very large, one being three quarters of an Inch long, and the other an Inch, where longest, as appears by the Figures explain’d above. Now this Gentleman thought himself entirely cured, after being reliev’d by *Mr. Cheselden*, which he declares in these Words, ‘I had the Assistance of *Mr. Cheselden*, and

‘ and, I thank God, I am now free of
‘ any Pain, and have been so ever since.’
And Dr. *Hartley* says, ‘ it may be sup-
‘ posed that these two Kernels were left
‘ in his Bladder when he discontinued
‘ the Medicines.’ It would not be al-
together so well to say in every Case,
what was asserted in Mr. *Gardiner’s*,
that the Stones found at his Death
grew after his Disuse of the Medicines;
for we have shew’d, every Person
in his Case, that is even cut, has not a
Stone afterwards; and it is most certain
Mr. *Carteret’s* were in his Bladder
when he thought himself cured. From
this a difficult Question arises; Why was
he easy till he dyed, having rough *Nu-
clæi* and so large in his Bladder? Or
let us (for the present) suppose he had
none when he left the Medicine off;
but that these were newly grown in the
absence of an Alkaline Urine: Why did
he not feel fresh Pain upon the Ac-
cretion of these large Stones, since he
had so much frequent Pain before he
took the Medicines? There seems to
be

be no escaping the natural Result that must occur to every rational Person; that he could not feel them, the *Tone* of the Bladder, and consequently *Sensation* being quite lost.



Q CASE



C A S E V I I I .

*The Case of Mr. GARDINER in
Fetter-Lane.†*

‘ **M**R. *Gardiner* is sixty Years of
 ‘ Age, and has had the Symp-
 ‘ toms of the Stone in the Bladder a-
 ‘ bout six Years. For many Months
 ‘ pass’d has had such frequent Provoca-
 ‘ tions to make Water, that he could
 ‘ not lye in Bed five Minutes together.
 ‘ He had also great Forcings to Stool,
 ‘ and made bloody Water upon riding
 ‘ or walking much. He was examin-
 ‘ ed on the thirtieth of *December* last,
 ‘ by Mr. *Nourse*, who found a Stone in
 ‘ the Bladder; and on the second of
 ‘ *January* he began Mrs. *Stephens’s*
 ‘ Medicines. At first they encreased
 ‘ his

† *View of the pres. Evid.*

his Pain, but before he had taken
them a Month, he became very easy,
and has since walk'd as far as the
Royal Exchange, without making
bloody Water, or finding Inconveni-
ence, and can pass a whole Night
without an Occasion of making Wa-
ter at all. He continues the Medi-
cines and brings away (besides a clou-
dy Sediment in his Urine) a conside-
rable Quantity of Grit, both in Size
and Colour very much like common
House Sand.

This Case is one of those produced,
as having been cured by the Medi-
cines, as it was declared before the
Trustees appointed by Act of Parlia-
ment to examine them; the Account
laid before them is as follows :

† Mr. *Gardiner* of *Fetter-Lane*,
aged 61, who had the usual Symp-
toms of a Stone in the Bladder, with
Q 2 violent

† *Supplement to the View of the Pres. Evid. p. 48.*

Remarks on the Case

' violent Pains for several Years. He
 ' was search'd by Mr. *Nourse* Surgeon,
 ' December 30, 1738, when both he and
 ' Mr. *Wall* Apothecary felt a Stone in
 ' the Bladder. Mr. *Gardiner* took the
 ' Medicines about eight Months, void-
 ' ed many Pieces of Stone in that time,
 ' was freed from all his Symptoms, and
 ' being search'd again, first by Mr. *Sharp*
 ' September 14, 1739, and then on the
 ' 13th of *November* following by Mr.
 ' *Nourse*, Mr. *Chefelden*, Mr. *Saintbill*,
 ' and Mr. *Belcher*, Surgeons, at *Child's*
 ' *Coffee-house* in *St. Paul's Church-yard*,
 ' no Stone could be found.

An Account to the same Purpose is
 published in his *Latin* Pamphlet printed
 at *Leyden*, we shall therefore only in-
 fert here what seems an additional Ani-
 madversion to the rest, which is: ' It
 ' is remarkable, that this Person be-
 ' came free from his Pains within a
 ' Month after he began the Medicines,
 ' tho' it is very certain, from the Quan-
 ' tity of soft and ragged Fragments
 ' voided by him afterwards, that a large
 ' and

‘ and ragged, but a soften’d Stone must
‘ have remained in his Bladder.’

Note, This last Animadversion was made by the Doctor, after the Death (and finding the Stones in the Bladder of) Mr. *Gardiner*; and, at the same Time, the following Account was produced, to prove this Patient had taken no more Medicines from the Time he thought himself cured, to his Death, at least but very few. Whether he did or no, will appear in the Sequel: But before we set down the Account, take the Doctor’s following *Particulars*, which, he says, are to be added to those contained in the foregoing Extracts.

‘ 1. That Mr. *Gardiner* had no Return of his violent Symptoms, but only some small Complaints, which he thought to proceed from Gravel.

2. That Mr. *Gardiner* took no Medicines for the Stone from the Beginning of *September* 1739, till *December* 1740, when he took a small

Q3

‘ Quantity

‘ Quantity of Soap-lees, sufficient per-
 ‘ haps for three or four Days in the re-
 ‘ gular Way. And again, that he took
 ‘ nothing from this Time till *July*
 ‘ 1741, when he began to take some
 ‘ Pills which he had from Mrs. *Stephens*,
 ‘ and took in all about 55 Ounces of
 ‘ them. These 55 Ounces are a Quan-
 ‘ tity sufficient for about three Weeks
 ‘ in the regular Way of taking.

‘ 3. That after Mr. *Gardiner*’s Death,
 ‘ six Cavities were found near the Neck
 ‘ of his Bladder containing nine Stones,
 ‘ two or three of which are about the
 ‘ Size of small Nutmegs, and the rest less.

‘ 4. That when Mr. *Nourse* examin’d
 ‘ Mr. *Gardiner*, *December 30, 1738*,
 ‘ he felt a Stone immediately upon In-
 ‘ troduction of the Catheter into the
 ‘ Bladder, and continued to feel it which
 ‘ Way soever he turn’d the Catheter.

‘ From all these Circumstances com-
 ‘ pared together, I conclude, that Mr.
 ‘ *Gardiner*’s Urine had a dissolving
 ‘ Power

' Power during the Time that he took
 ' the Medicines regularly. But I will
 ' not trouble the *Society* with a Repeti-
 ' tion of the Observations which I have
 ' formerly made upon such like Cases.
 ' I rather chuse humbly to beg of the
 ' *Society*, that, as this Matter is of very
 ' great Consequence to Mankind, they
 ' would please to appoint some of their
 ' Members to enquire into the Facts re-
 ' lating to the Operation of the Medi-
 ' cines, and to lay the Result of their
 ' Enquiries before the Society from time
 ' to time. I would also humbly beg,
 ' that Mr. *Nourse* may be one of the
 ' Persons appointed for this Purpose.

Jan. 27.

1741-2.

D. HARTLEY.

The Method here proposed to the
Royal Society by the Doctor, would be
 the most effectual Means of concealing
 from the Publick the *Inefficacy* and
Danger attending the Use of these Me-
 dicines; for it would take up Years, in
 teasing that most learned Body to little
 Purpose from time to time. What bet-

ter Intelligence could be had, than those Cases communicated from other Parts of the Kingdom already set down in a Train, in the *View of the Pres. Ev. &c.* Besides, since there are now sufficient Evidences of their (*Defect* in their Duty and) *mischievous Qualities*, the Reference should be made to the Publick at once, as they are in general concern'd, and that *Honourable Society*, as a Part of the Publick, will also receive it: Whereas there are not many that have any Knowledge of what is transacted *peculiarly* in the *Society*.

But before we take any Notice of the Nature of this Case, I shall set down the above-mentioned Bill, as also the Account of the Case, as it was given to the *Royal Society* by that ingenious Surgeon Mr. *Nourse*, who open'd Mr. *Gardiner's* Body.

To Dr. HARTLEY.

S I R,

I Nspecting the Books of Mr. *Arthur Gardiner* late of *Fetter-Lane, Lond.*
deceased,

deceased, I found an Account of Mrs. Stephens's Medicines, written with his own Hand, a Copy of which I herewith send you, and presume, by the Number of Balls, and Money paid for each Parcel, you will be able to judge how much of the Powder he had. I am,

S I R,

Your most humble Servant,

RICH. HATTON.

*An Account of Mrs. STEPHENS'S
Medicine.*

		<i>l.</i>	<i>s.</i>	<i>d.</i>
1739. Jan. 1.	For ten Balls and Powder	2	0	0
Towards the End of the Month, but no Date,	For ten Balls and Powder	2	0	0
Feb. 21.	For ten Balls and Powder	2	0	0
Mar. 26.	For ten Balls and Powder	2	0	0
Apr. 17.	For five Balls - -	0	10	0
28.	For ten Balls and Powder	2	0	0
May 21.	For five Balls - -	0	10	0
June 5.	For five Balls and Powder	1	0	0
18.	For three Balls --	0	6	0
30.	For five Balls and Powder	1	0	0
July 12.	For five Balls - - -	0	7	6
Aug. 2.	For five Balls and a Bottle of Powder - - -	0	11	6
11.	For five Balls - - -	0	7	6
24.	For five Balls - - -	0	7	6
1740. Dec. 12.	A Pint Bottle of Soap-lees	0	1	0
1741. July 14.	Two Quarts of Pills -	0	16	0

From

From the Transactions of the
ROYAL SOCIETY, N^o. 462.

A Letter from Edward Nourse, F. R. S. Surgeon to St. Bartholomew's Hospital, to the President and Fellows of the ROYAL SOCIETY, giving an Account of several Stones found in Bags, formed by a Protrusion of the Coats of the Bladder, as appeared upon opening the Body of one Mr. Gardiner. Read Jan. 7. 1741-2.

PERmit me to lay before you the *Bladder of Mr. Gardiner*, who was, the 5th of *March 1739*, before the Trustees appointed by the Parliament to enquire into the Efficacy of *Mrs. Stephens's Medicines*, produced as an Instance, where they had been effectual in dissolving the Stone in the Bladder.

Mr. Gardiner was search'd by me on *Saturday the 30th of December 1738*. I felt a Stone the Moment my Instrument was introduced ; which
was

was likewise felt by Mr. *Wall* his Apothecary, then present.

The *Tuesday* following, he began to take Mrs. *Stephen's* Medicines, and continued them eight Months.

On the 30th of *November* 1739, I saw him at *Child's* Coffee-House, when he told me he was quite free from his usual Disorders: I there search'd him again in the Presence of several Physicians and Surgeons, who likewise felt for the Stone, but none could be found.

Mr. *Gardiner* dying on *Saturday* the 2d of *January* 1741-2, the next Morning, in the Presence of Mr. *Sainthill* and Mr. *Wall*, I opened his Bladder, and therein observed six preternatural Apertures of different Sizes, the biggest capable of admitting the Top of my Finger. Each of these Openings led to a separate Bag, form'd by an Enlargment of the internal Membrane of the Bladder, protruded between the Fibres of its muscular Coat.

These Bags are to be seen on the back Part of the Bladder, a little above the *Vesiculæ Seminales*; and when viewed on the outside, seem to be but two; tho' they are in Number equal to the Openings within, already mentioned; and divided from one another by the Duplicature of the internal Membrane, which forms a *Septum* between each of them.

In these *Sacculi* or Bags are contained nine Stones; the largest about the Size of a small Nutmeg; and with what Facility some of them moved out of, and return'd into the *Sacculi*, the following Circumstance will clearly evince.

When I had opened the *Abdomen*, Mr. *Sainthill* handling the Bladder, brought two of these Stones up to its *Fundus*, where they were felt by Mr. *Wall* and myself. We then examin'd the Kidneys; the right contained a little Matter, otherwise it was as it should be; but of the left, two Thirds were wasted;
its

its *Pelvis* was contracted in Proportion, and the *Ureter* almost impervious. Upon rehandling the Bladder, neither of us could find any Stone: I therefore laid it open, and we found them all in the *Sacculi*. The Stones that are in one of these *Sacculi* have been so much enlarged since their Lodgment, that without Force and Laceration they cannot be got out. I am

GENTLEMEN,

Your most Obedient, and

most Humble Servant

EDW. NOURSE.

T A B. VII.

Fig. I.

Represents the back View of Mr. Gardiner's Bladder, with the two *Sacculi* hanging to it, as big as the Life.

A. The *Prostate* Gland, which in this Subject is grown *Schirrous*, and lost its Shape: As did also,

B. The *Vasa deferentia* & *Vesiculæ seminales*, which are turn'd upon the *Prostate* Gland to bring the *Sacculi* more in View.

C. The small *Sacculus* that contain'd the biggest Stone thrust out on the Right-side of the *Detrusor*, between that and the Insertion of the *Urethra*.

D. The large *Sacculus* thrust out on the other Side the Handle of the *Detrusor*, and fasten'd in one Point + to the Ligament of the *Vesiculæ seminales*.

E. The *Musculus Detrusor Urinæ*.



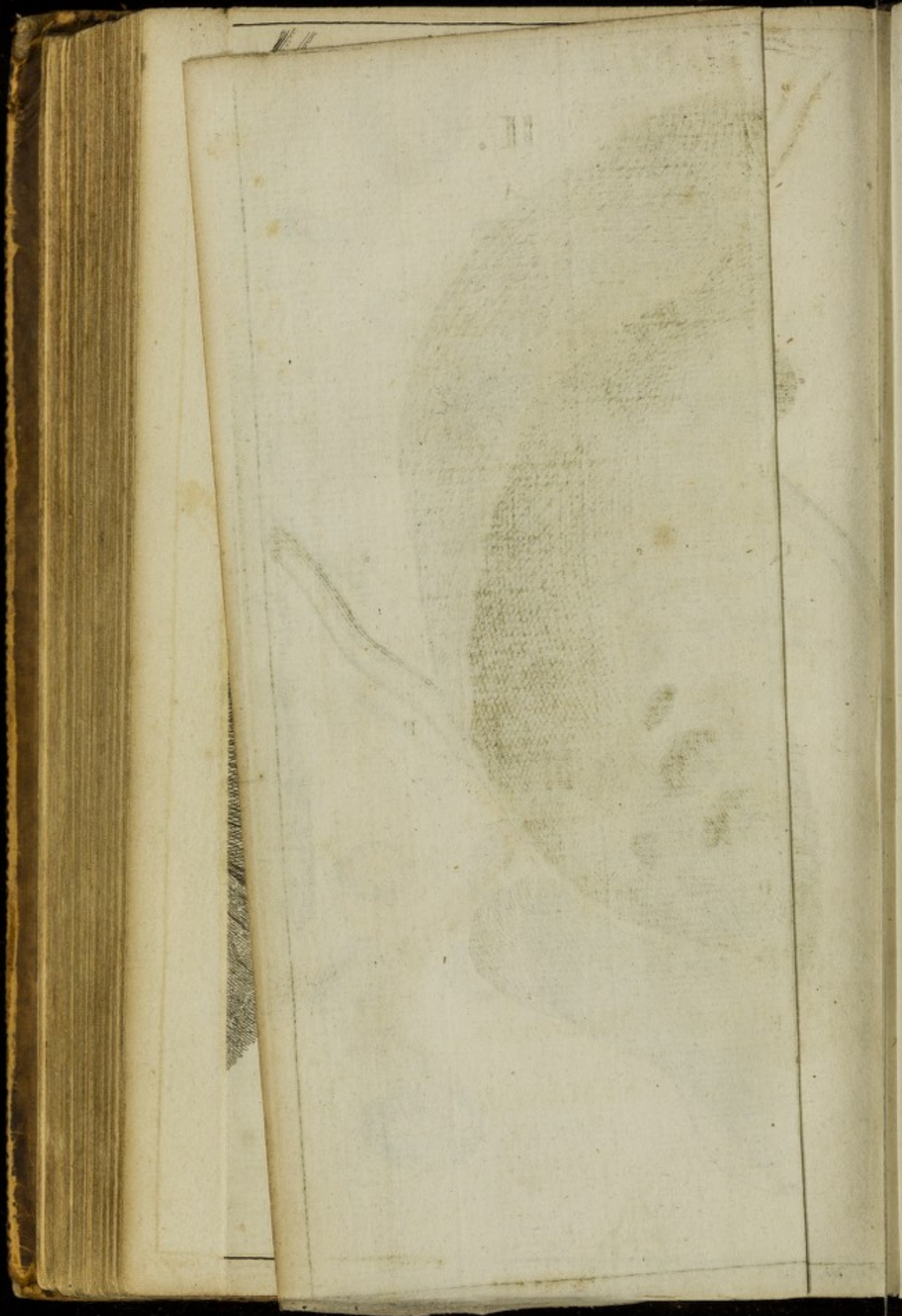
TAB. VII.

I.



II.





T A B. VII.

Fig. II.

Represents a fore View of the Bladder laid open, to shew the several Orifices of these *Sacculi*.

A. The upper Part of the Bladder, the *Detrusor* being cut longitudinally.

B. The inner Membrane of the Bladder, which has lost all its natural *Rugæ*.

C. The three Orifices that lead to the large *Sacculus*, in which are several particular Cells that do not communicate with each other.

d. The Orifices of the *Ureters*.

E. The Orifice of the *Urethra*, and the *schirrous* Gland.

F. The *Ureters*.

G. The two Holes leading into the smaller *Sacculus*.

h. The Orifice of an imperfect *Sacculus*.

1. 2. Several Stones that came out of the *Sacculi*.

REMARKS.

R E M A R K S.

THE Case of Mr. *Gardiner* is very particular, and the more so, as he was said to have been absolutely cured. But alas! he was far from a Cure; for Mr. *Nourse* at his Death opened his Body, and found a Number of Stones inclosed in Cells, which were thrust out by degrees into two *Sacculi*, that appeared on the Outside of the Bladder.

Upon Mr. *Nourse's* searching him a second Time, no Stone was found; this was a strong Presumption, no doubt, of his having been cured; but it is no great Wonder that there was not a Stone found, because by this Time they were all bury'd in the Cells the Medicines were so kind as to help them to; and tho' no such Cells had been form'd, yet there want not many Examples of Persons being search'd a second, third, nay a fourth Time before the Stone could be found; and on the other Hand, several

veral Instances have happened where a Stone was said to be felt, a Person tyed up for the Operation, and even cut, and no Stone to be had at last : Hence it appears how we may be deceived in that Case, and that the only Evidence, as we have before observ'd, of Certainty and Truth, must be the Opening of the Body after Death.

But say some, Mr. *Gardiner* ceased taking the Medicines after he was cured, and therefore these Stones found in his Bladder were generated afterwards. In Answer to this it is asserted by Persons of undoubted Honour and Veracity, that he continued them more or less to the End of his Life, whose Certificates and some Affidavits against them are at the End of this Case. If he did take them, the Medicines have not the Efficacy pretended; for if a Stone had been dissolved in this Gentleman's Bladder, by a Continuation of the Medicines, in the usual Dose and Manner prescrib'd, sure it must be allow'd that a much less Quantity, even an eighth part of the

R same,

same, would be a sufficient Preservative everafter, to impregnate the Urine with a Quality of hindering further Concretions. And it appears in Mrs. *Stephens's* Publication of the Medicines in the *Gazette* of June 16, 1739. that no more is required to prevent the Formation of *Gravel* and *Gravel Stones*, in Constitutions subject to breed them, than ten or fifteen of the Pills taken every Day. Which is no more than about an eighth Part of the full Dose mentioned in the same Paragraph.

However, it is deny'd that he took a sufficient Quantity to answer that End, for two Reasons; first, because it does not appear upon his Books, or those of Mrs. *Stephens*; and secondly, because when Gravelly Complaints return'd sometime after he was thought cured, he consulted with Doctor *Hartley* what to do, who then advised him to Soap-lees, as he declared in defending the Efficacy of the Medicines in this Case, from whence the Doctor concludes he had not taken any. But as
all

all Opinions are not alike, I confess mine is, That he had taken the Medicines from that very Reason; for, is it not natural to think that a Man so sensibly relieved, as was reported, from the rack-
ing Pains he suffer'd before, should fly to the same Remedy, when he knew without Hesitation, he could have had enough of several others besides Mrs. Stephens, (for it was made by many after its Publication) and that finding it *inefficacious*, he had Recourse to the Doctor for his Advice? In this Light I am inclined to think the Conclusion falls more rationally. But one would wonder, if the Medicines had cured him before, why the Doctor did not advise him to the same, rather than to Soap-
lees. Can any one imagine otherwise, than that the Doctor himself distrusted them, when he preferr'd any thing else to them?

Those who have been cut for the Stone, and are troubled in some time by new Ones generated, are but a few among the Train of such as suffer in

this Disease, which is a great Happiness to the World. I will not take upon me to judge of the Proportion, but leave it to Surgeons who have it more in their Way to observe; but I remember Mr *Freke*, who is a noted Lithotomist, in his Dispute with Dr. *Hartley* declared the same, which we may presume he knew from Experience.

Now when the Fluids of the Body have been impregnated, for such a Series of Time, and by such large Quantities of the Medicines, it is very improbable that the *Stone-generating Quality* should so soon return, and produce fresh Stones, since it so seldom happens where nothing is administered but manual Operation, and no Change brought about in the Constitution; and much the more improbable since Mr. *Gardiner* has taken the Medicines, more or less, all along; as appears by the following Certificates of so many Persons of Credit, as Doctor *Rumney* Vicar of Saint *Stephens*, Dr. *Cotton*, Mr. *Strong*, and Mrs. *Eliz. Partridge*, all of St. *Albans*.

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Here is another Reason to believe these were the same Stones found by Mr. *Nourse*, that caused the Patient's Uneasiness all along: for in the Case as it is first laid down by Dr. *Hartley*, it appears that what was voided upon taking the Medicines, was only *Grit*, in Size and Colour like House-Sand. Now each Grain of *Grit* or *Gravel* is actually a Pebble, tho' never so small, and differs so widely from an Appearance of *Dilamination* or *Dissolution*, that it cannot be said with the least shew of Probability, that they were parts of a dissolved Stone.

Yet I find by the Account given in, to the Trustees appointed to examine Mrs. *Stephens's* Medicines, it is said, that what Mr. *Gardiner* voided were Pieces of Stone: whereas in the *View of Pres. Evid.* it is only said a cloudy Sediment, and a considerable Quantity of *Grit*, in Size and Colour like common House-Sand. It seems odd, since the Description of this *Grit* is so particular

cular in the latter, that the Pieces of Stone should be forgot there ; or that the Grit and cloudy Sediment should be forgot in the former. Indeed it argues more Efficacy in the Medicines, before the Trustees, to say they brought away *Pieces* of Stone, than Grit or Sediment.

As these Stones found in Mr. *Gardiner's* Bladder, are all alike in Colour and Consistence, and very close and compact in their Surfaces, having no Signs of Diffolution upon them ; it is very reasonable to think them capable of resisting the Power of the medicated Urine, and that therefore no Stone was dissolv'd in his Bladder. For can any one suppose he had a Stone of another Contexture, or softer than those now found ? When they differ not in any wise, except their Size, from one another ; the Cohesion of their Particles being very hard, and alike firm in all. Or in other Words, can a *Pumice*-Stone and a hard *Pebble* be proper to the same Bladder ? Surely no ; for it is probable the Urine will always produce

duce the same Particles for the Generation or Production of Stones in the same Person ; and I am inclined to believe, whatever Number of Stones is in the same Bladder, (tho' they differ in Size and Figure) yet their Cohesion of Parts, Substance, or Solidity, will be always the same. I can affirm that all I have seen have been so ; as those of Mr. *Payne*, those of the ancient *Woman*, those of Mr. *Skrine*, those of the *present Case*, a Bladder-full shewed me by Dr. *Douglas*, and a Cluster which Sir *Hans Sloan* has from the Bladder of a Man, as well as many Cases I have read of in several Authors : So that from so many Facts one would be apt to think, it was the common *Standard* of a Plurality of Stones in the same Bladder.

As to the Formation of the *Cells* or *Loculi*, in which the Stones were found in this Gentleman's Bladder, take the following Essay towards explaining it. The Figure of the natural Bladder in the Beginning, shews the true State of

that Organ ; now any Form digressing from that natural State, is morbid ; and is caused by something acting preternaturally upon it ; and, as we have before shewed the Parts which are subject to Dilatation, it remains to shew the true Cause of the *Sacculi* in this Case.

When a Person is in the racking Torture of the Stone grinding on the inner Orifice of the Bladder, he naturally throws himself into that Situation which most favours his Ease, and that is, to lye on his Back ; in this Position he no doubt will continue as long (and resume it as often) as he can. Thus being for the most part on his Back, the Stones contained in his Bladder, must necessarily fall into the *Sinusses* on each Side the posteriour Neck or Handle of the *Detrusor* Muscle, for they cannot rest upon it, being more eminent, and the weaker Parts on each Side being naturally form'd to receive them.

This being the Case, nothing is wanting but what may qualify the Bladder

der

der for their better Reception. Why, Mrs. *Stephens's* Medicines have done this compleatly; for since they could not dissolve the Stones, it was the least they could do to help them to, and confine them in, their present Cells; by destroying the Tone of that Part, and consequently rendering its weaker Sides more susceptible of Dilatation by the Pressure of the Stones.

A very convincing Proof of the Formation of the Cells after the Stones, is, that there are several, because there are several Stones; not that each Stone is in its particular Cell, for that would be too precise and methodical to expect; but that as there were several Stones, which falling irregularly in different Clusters on each Side of the foresaid Neck of the Muscle, must be allowed to have thrust out more Cells than one: Whereas, if there was but one Stone, there could be but one Protrusion, at least but one Cell. Wherefore we must conclude upon this Question, that either the Cells were made for the Stones, or
the

the Stones for the Cells. Now, to suppose the latter, would be a gross Absurdity; but there is a natural Reason for the former. Therefore the Medicines may be the *antecedent*, and the Stones the *efficient* or *immediate* Cause of the said *Sacculi*, or Cells.

Now, as the only Plea Dr. *Hartley* seems to have for the Defence of the Efficacy of the Medicines in this Case of Mr. *Gardiner* is, that the Patient was once cured, and that he had not taken a sufficient Quantity of them after the Dissolution of the first Stone, to prevent the Growth of others; notwithstanding it is proved there was no Stone dissolved in his Bladder, whether he took them since or no: Yet the Impartial Reader will find he had taken them, by the following Certificates, in Opposition to which the Doctor produced the Affidavits that come after them. Let every one judge of the Validity of either, and consider the Nature of the latter, and, I believe it will be easily seen the *Certificates* are positive Proofs on one Side,
which

which the *Affidavits* are not on the other.

The Certificate of Mrs. Partridge.

‘ I *Elizabeth Partridge*, of the Pa-
‘ rish of *St. Peter’s* in *St. Albans*, do de-
‘ clare, that last Summer I came with
‘ *Mr. Gardiner* from *Mr. Keen’s* in
‘ *Fetter-Lane* (*London*) to *St. Albans*,
‘ and that, that Morning before we came
‘ out of his Lodgings, I saw him take fe-
‘ veral Pills in *Mr. Keen’s* Room behind
‘ the Shop, and that he told me the Me-
‘ dicine he was then taking was *Mrs.*
‘ *Stephens’s* for the Stone; that he took
‘ those Pills out of a Pint Bottle, and
‘ said he would take the Remainder
‘ with him to *St. Albans*; which he
‘ accordingly did. I do also further de-
‘ clare, that for part of three Summers
‘ last past, when the said *Mr. Gardi-*
‘ *ner* was at *St. Albans*, he constantly
‘ took Medicines, either in Pills, or in
‘ some other Shape, which he affirmed
‘ were *Mrs. Stephens’s*. In witness
‘ whereof,

Remarks on the Case

‘ whereof, I set my Hand this 11th Day
 ‘ of *Feb.* 1741.

ELIZABETH PARTRIDGE.

The Certificate of the Reverend
 Dr. RUMNEY.

‘ Whereas it hath been reported, that
 ‘ Mr. *Arthur Gardiner*, late of *Fetter-*
 ‘ *Lane, London*, who was supposed
 ‘ some time ago to be cured of the
 ‘ Stone by taking Mrs. *Stephens’s* Medi-
 ‘ cines, did not of late Years persist in
 ‘ taking the said Medicines : This is to
 ‘ inform those Asserters, or any other
 ‘ whom it may concern, that last Sum-
 ‘ mer, about *July* or *August* (to the
 ‘ best of my Remembrance) the said
 ‘ Mr. *Gardiner* came down to *St. Al-*
 ‘ *bans*, in the County of *Hertford*, and
 ‘ that within a few Days after he came,
 ‘ I saw him take several Pills of a blew-
 ‘ ish Colour, like hard Soap discolour’d,
 ‘ and about the Size of a small Pistol
 ‘ Bullet, which he assured me were
 ‘ Mrs. *Stephens’s* Medicines, and that
 ‘ he took *fifty* or *sixty* of them in a Day
 ‘ by Mrs. *Stephens’s* Order and Direc-
 ‘ tion,

‘ tion, because he had *now* and *then* the
‘ same Sort of Symptoms, as he used to
‘ have, of the Stone before he was
‘ cured (as he called it.) Some time
‘ afterwards he told me, he had sent for
‘ another *Bottle* of those Pills, (a *Bottle*
‘ being, as I apprehended, the Vehicle
‘ used to convey them in) and that his
‘ Landlord, or Landlady (in *Fetter-*
‘ *Lane*) was to procure it from Mrs.
‘ *Stephens*, and send it to *St. Albans*.
‘ In witness whereof, I set my Hand this
‘ 11th Day of *February*, 1741.

JOHN RUMNEY,

Vicar of St. Stephen's.

The Certificate of Dr. COTTON of
St. Albans, in a Letter to Dr. RUM-
NEY.

Reverend Sir,

‘ In Pursuance of your Desire, I shall
‘ here send you the best Account I can
‘ of the Conferences that pass'd at Times
‘ between the late Mr. *Gardiner* and
‘ myself

Remarks on the Case

‘ myself on the Subject of his Illness.

I am, Sir,

Your most obedient Servant,

St. Albans, Feb. 11.

H. COTTON.

1741-2.

‘ Mr. *Gardiner*, a Gentleman aged
 ‘ 60, some Years ago was relating to
 ‘ me his Complaints, which so resem-
 ‘ bled the general Symptoms of a Stone
 ‘ in the Bladder, that I advised him
 ‘ upon his Return to Town to be
 ‘ searched. He afterwards inform’d
 ‘ me, that he was search’d by one or
 ‘ more eminent Surgeons in *London*,
 ‘ who pronounced that he had a Stone
 ‘ in the Bladder.

‘ Upon this Discovery Mr. *Gardiner*
 ‘ had Recourse to Mrs. *Stephens’s* Me-
 ‘ dicines, which he told me had cured
 ‘ him. But as the various Circum-
 ‘ stances of this Case are known to you
 ‘ already, I shall not expatiate upon the
 ‘ Subject. I would only observe, that
 ‘ upon

‘ upon the frequent Interviews which
‘ we have had together in this Town, I
‘ understood by his Discourses, that he
‘ had all along, or with very short In-
‘ termiſſions, purſued the Medicines,
‘ from his firſt Application to Mrs. *Ste-*
‘ *phens*, to the laſt Converſation which
‘ we held upon this Topic; and laſt
‘ Summer in particular, I have been re-
‘ peated Times an Eye-witneſs of his
‘ taking Mrs. *Stephens’s* Pills. That
‘ when I have interrogated him, why
‘ he perſiſted in ſuch a nauſeous Medi-
‘ cine, at a Time when he was ſatiſfied
‘ that he was perfectly cured? His Re-
‘ ply was to this Purpoſe, That Mrs.
‘ *Stephens* had adviſed him to continue
‘ the Uſe of her Medicines, to prevent
‘ future Returns of his Complaints.

The Certificate of Mr. STRONG of
St. Albans.

‘ Mr. *Arthur Gardiner*, late of *Fet-*
‘ *ter-Lane, London*, has for ſeveral
‘ Years paſt ſpent two or three Months
‘ with me at my Houſe at *St. Albans*,
‘ and ever ſince he has been under Mrs.
‘ *Stephens’s*

‘ *Stephens’s* Medicines for the Stone, I
 ‘ do aver, that he constantly took the
 ‘ said Medicines publickly in my House,
 ‘ almost every Day during his Abode
 ‘ with me; but more particularly, last
 ‘ Year he took the said Medicine in
 ‘ Pills of a blewish Colour, about the
 ‘ Bigness of a Hazle Nut, which he
 ‘ constantly carried about him in a Box,
 ‘ and told me that he took about sixty
 ‘ in a Day of them: And I do declare,
 ‘ and so can my Servants too, that one
 ‘ or other of us see him take the Pills
 ‘ every Day in the Month of *July* and
 ‘ *August* last past. Witness my Hand,

J. STRONG,

St. Albans, Feb. 11.

1741-2.

AFFIDAVIT I.

‘ I certify by these, that having liv’d
 ‘ with *William Keen*, Tallow-Chandler,
 ‘ as a Servant, from the 10th of *May*,
 ‘ 1740, unto this Day, the 1st of *March*,
 ‘ I have always attended Mr. *Arthur*
 ‘ *Gardiner* whilst in Town, unto the
 ‘ Time of his Death, which was in *Ja-*
 ‘ *nuary*

‘ *nuary* last, and do affirm, to the *best*
‘ *of my Knowledge*, that he never took
‘ any Pills, or other Medicines, of Mrs.
‘ *Stephens*, till the latter End of *July*
‘ last, which then he took by way of
‘ Prevention. I farther remember, that
‘ Mr. *Gardiner* declared, about the
‘ Month of *May* 1740, he never took
‘ any Medicines since he had been cur’d.
‘ And having been to visit Mrs. *Stephens*,
‘ she was very angry with him, because
‘ he would take none to prevent breed-
‘ ing of the Stone afresh.

RACHAEL COMPTON.

Middlesex, to wit :

Sworn voluntarily before
me this 1st Day of March,
1741.

THOMAS DE VEIL.

AFFIDAVIT II.

Westminster.

‘ *Elizabeth Golder*, of *Whitehall*, vo-
‘ luntarily maketh Oath before me, one
‘ of his Majesty’s Justices of the Peace
‘ for the City and Liberty of *Westmin-*
‘ *ster*, that she this Deponent, on the

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‘ 20th

' 20th Day of *July* last, went to Mrs. *Ste-*
 ' *phens* to consult with her about taking
 ' her Medicine for the Stone, and found
 ' Mr. *Gardiner* with Mrs. *Stephens*,
 ' who hearing this Deponent talk to
 ' her on that Subject, he told this
 ' Deponent, that he had been cured of
 ' the Stone by Mrs. *Stephens's* Medi-
 ' cines, and had quite discontinued tak-
 ' ing the same for two or three Years,
 ' to the best of this Deponent's Remem-
 ' brance ; and that he then was appre-
 ' hensive there was another Stone ga-
 ' thering, and ordered Mrs. *Stephens* to
 ' send him a Pound of Pills that Day.

ELIZ. GOLDER.

Sworn voluntarily before
 me the 2d Day of March,
 1741-2.

J.A. FRASER.

AFFIDAVIT III.

Westminster.

' *Joannah Stephens* voluntarily mak-
 ' eth Oath before me, one of his Ma-
 ' jesty's Justices of the Peace for the
 ' City and Liberty of *Westminster*, that
 ' *Arthur*

Arthur Gardiner of Fetter-Lane,
Gent. left off this Deponent's Medi-
cines about the Beginning of *Septem-*
ber 1739; and was, to the best of this
Deponent's Judgment, cured of the
Stone at that Time; and this Depo-
nent then endeavoured to persuade
him to take one Dose a Week, to keep
the Vessels clear from Gravel, which
the said Mr. *Gardiner* entirely neg-
lected. And this Deponent declares,
that he never had any Medicine of her
in what Shape soever from that Time
to the Month of *July*, in the Year
1741, when he came to consult this
Deponent, he being apprehensive of
some small Stone or Gravel being fell
from the Kidneys into the Bladder.

JOANNAH STEPHENS.

Sworn voluntarily before
me the 4th Day of March,
1741-2.

JA. FRASER.

*AFFIDAVIT IV.**Westminster.*

' *David d'Escherny* voluntarily mak-
 ' eth Oath before me, one of his Ma-
 ' jesty's Justices of the Peace for the
 ' City and Liberty of *Westminster*, that
 ' *Mr. Arthur Gardiner* came in *July*
 ' last to *Mrs. Stephens's* House, who
 ' happened not to be at Home then;
 ' and he told this Deponent, that he
 ' wanted to advise with her about some
 ' Complaint he had in his Bladder, hav-
 ' ing been her Patient, and thoroughly
 ' cured by her Medicines. And this
 ' Deponent ask'd him, whether he ne-
 ' ver had taken some since, to prevent
 ' the breeding of Gravel? who answer'd
 ' this Deponent, that he had always
 ' been from that Time free from Pain
 ' till lately, and had took none, nor
 ' would not, till he could see her the
 ' said *Mrs. Stephens*.

D. D'ESCHERNY.

Sworn before me the 4th
Day of March, 1741-2.

JA. FRASER.

The

The Sum of these Evidences runs thus:

By the Certificates of those credible Persons who saw him every Day while he spent his Summers at St. *Albans*, it is plain, Mr. *Gardiner* took Medicines for his Complaints commonly every Day; his own Discourses with them upon it confirm it; and Mr. *Strong's* Narration is not to be doubted, whose Family were Witnesses to his swallowing sixty Pills every Day, especially for two Months last Summer: And it is certain from Dr. *Hartley's* own Confession, that he had in *December* 1740, some Complaints, which he advised with him about, upon which the Soap-lees were ordered.

And yet *Rachael Compton* swears, that to the best of her Knowledge, the Patient never took any Pills, or other Medicines of Mrs. *Stephens*, from the 10th of *January* 1740, to the latter End of *July* last. This Evidence cannot prove any thing, for he might have

had and taken them, unknown to any Servant, if there were fifty in the House.

Mr. *Strong* proves he took them all the Months of *July* and *August*, and yet this Woman swears he came to Mrs. *Stephens* in the latter End of *July* to get some, and that then it was only by way of Prevention; as if he had had no Complaints since he was said to have been cured. However, it is said by this Evidence that he had visited Mrs. *Stephens* in *May* 1740; and if Mr. *Gardiner* had at any time declar'd he never took the Medicines, nor had any Complaints till the latter End of *July* last, he must have belyed himself; because Dr. *Hartley* proves he had, for which he took the Soap-
lees.

Eliz. Golder swears, that on the 20th of *July* last she met Mr. *Gardiner* at Mrs. *Stephens's*, and talking on the Subject, he declared he had been quite cured by the Medicines, and had discontinued them for two or three Years, to the best
of

of her Remembrance; and that he was then apprehensive he had another Stone, and ordered some Pills. It looks, in this Evidence, as if Mr. *Gardiner* spoke to please Mrs. *Stephens*, and promote the Sale of her Medicines, if he was there at that Time. To hear him say a Thing, and to know whether he did or did not such a Thing, are very different; therefore this Evidence signifies nothing.

Mrs. *Stephens* swears, she thought Mr. *Gardiner* cured in *September* 1739, and that he never had any Medicines from her, in what Shape soever, from that Time to the Month of *July* 1741, and that he entirely neglected taking a Dose a Week by way of Prevention. How could she swear he had entirely neglected it? Did she perpetually watch him wherever he went? And might not he have had Medicines elsewhere? for they were published in the *Gazette* of *June* 16, 1739, which was about three Months before he left them off, and prepared by many, as I have before observed.

Dr. *D'Eschberny* swears, he met Mr. *Gardiner* at Mrs. *Stephens's* House in *July* last, and ask'd him whether he had never taken any Medicines to prevent the Breeding of Gravel ; and that Mr. *Gardiner* answer'd, that he had always been free from Pain till lately (from the Time of his being cured) and had took none, nor would, till he saw Mrs. *Stephens*.

It is strange he should say he was always free from Pain till lately, when he apply'd to Dr. *Hartley* in *December* 1740, for a Remedy in his Pain.

In the whole Matter, there is nothing in these Evidences that can prove he took no Medicines : for hearing a Man say this or that, and affirming a Thing to the best of one's Remembrance or Knowledge, I believe will not be allow'd sufficient to prove any thing before impartial Judges.

CASE



CASE IX.

† *The Case of* THEODORE BRINK-
MAN, *Esq*; *Valet de Chambre*
to his Majesty.

‘ **H**E has been much troubled with
 ‘ Pains in his Back, frequent
 ‘ Irritations to make Water, and a
 ‘ Scalding; has at times voided Gra-
 ‘ vel and Slime; had sudden Stoppages
 ‘ of Urine in a full Stream, and felt a
 ‘ Provocation to go to Stool when he
 ‘ made Water. He was however able
 ‘ to ride in a Coach, till at last he
 ‘ made bloody Water, and could not
 ‘ bear it any more; and as his Paroxifms
 ‘ had come upon him for some time
 ‘ so much worse, that he had no Rest
 ‘ Night nor Day, he resolved to make
 ‘ use of Mrs. *Stephens’s* Medicines, and
 ‘ has now taken them for about five
 ‘ Months.

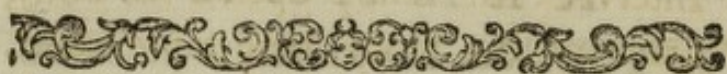
† See *View of the present Evidence.*

‘ Months. The three or four first
‘ Days, he suffer’d a great deal with
‘ the Sharpness of Urine, but ever since
‘ has had much less Pain, and makes
‘ Water more freely, nor has he the
‘ sudden Stoppages before mentioned;
‘ the Provocations to go to Stool at the
‘ time of making Water, are likewise
‘ in a less Degree. He voids much
‘ Mucus every Night with his Urine,
‘ and the Glasses in which it is kept,
‘ have a sandy Concretion sticking to
‘ their Sides. He has also several times
‘ parted with little whitish, solid, rough
‘ Particles of hard Matter; he feels of-
‘ ten a Heaviness, with a Sinking and
‘ Burning at his Stomach, especially in
‘ an Evening; which yet he had in a
‘ greater Degree before he begun the
‘ Medicines. Upon the whole, he is
‘ considerably relieved as to his Symp-
‘ toms, has a good Appetite, and is free
‘ from Sicknes; but he still feels that
‘ his Kidneys are far from being clear,
‘ having from time to time Pains in his
‘ Back, with an Irritation to make
‘ Water, and a Scalding.

R E-

R E M A R K S.

DURING the use of these Medicines, we find (1.) this Gentleman voided much Mucus every Night; this the Medicines were very capable of scraping off, as in the Case of Dr. *Kirkpatrick*. And (2) the Glassess in which the Urine was kept, had a Sandy Concretion sticking to their Sides. It is a wonder this should happen during the use of the Medicines, in this Patient, because it is elsewhere boasted, that the medicated Urine dissolves such Concretion. And indeed one would imagine, in the Description of his Case, that he received considerable Benefit; but whatever Services the Medicines may be said to have done this Gentleman, it is very plain he had not a Dissolution of the Stones in his Bladder, tho' he took them five Months; for he continued to 'have from time to time Pains 'in his Back, with an *Irritation* to make 'Water, and a *Scalding*;' and besides, when he died in his Return from *Hannover* with his Majesty, at *Harwich*, soon after his Landing, several *Stones* were found in his Bladder.



CASE X.

The Case of RICHARD SYMONDS †.

‘ FIG. 3, and 4, represent a Stone
 ‘ taken from *Richard Symonds*.
 ‘ He was seventy-eight Years old, had
 ‘ been afflicted with the Stone for about
 ‘ three Years, and was quite worn out
 ‘ by his Pains, a Looseness, Palsy, and
 ‘ old Age. He took the Medicines al-
 ‘ most six Weeks, but not in full Quan-
 ‘ tity, on account of his Looseness and
 ‘ great Weakness. He voided many
 ‘ Scales, his Urine deposited a Sedi-
 ‘ ment like wet Mortar, and he was al-
 ‘ most entirely freed from his calculous
 ‘ Complaints. Upon this he left off
 ‘ the Medicines, and died about a Fort-
 ‘ night after, having scarce felt any
 ‘ Uneasiness from the Stone in that
 ‘ Inter-

† *Supplement to a View of the Present Evid.* p. 93.

‘ Interval. Mr. *Sharp* open’d his Body,
 ‘ and took the Stone, here represented,
 ‘ out of his Bladder.

‘ The Parts of the external Shell,
 ‘ which are left on, are in several Pla-
 ‘ ces more than one eighth Part of an
 ‘ Inch thick. This Stone was so soft
 ‘ while wet, that it crumbled with the
 ‘ slightest Touch of the Fingers ; which
 ‘ was probably the Reason of his being
 ‘ easy, notwithstanding that he had so
 ‘ large and so rough a Stone in the
 ‘ Bladder. It was also covered with a
 ‘ very thin Coat of a redish brown
 ‘ Colour, seeming to have been gene-
 ‘ rated in the Interval of his Difuse of
 ‘ the Medicines ; for the Parts under-
 ‘ neath were white, as if acted upon
 ‘ by the medicated Urine.

R E M A R K S.

IN this Case, six Weeks taking the
 Medicines, and that not in full
 Quantity, are thought to have done
 more than many Months in others. But

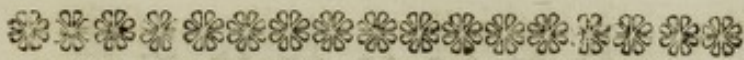
why so favourable an Approbation of their Action for so short a Time here? Why truly, here is a *Stone* found in the Bladder after his Death, with an unequal Surface, which it is readily said is from an Erosion made by the Medicines. This might have been the Case, but it is as probable that it might not, therefore the Question is very doubtful: However, for Evidence, the latter Supposition seems most likely, because here is as large a Stone as this taken from the Bladder of the young Gentleman mentioned before, having the same Appearance of Erosion in all Respects; (as also those of the old Woman) which are, in proportion to their Size, more eroded than any produced. This naturally leads me to ask two Questions upon the Case. I. If the Stone taken out of Mr. Symonds's Bladder had no Signs that favoured the Doctrine of *Erosion*, but was a smooth Stone, would it not have been maintained that six Weeks Time, and not having taken the Medicines in due Quantity neither, could not be expected to have done any thing?

since in other Cases so great a Quantity of the Medicines, and so long a Time of taking them are thought hardly sufficient. And, 2. If the aforesaid young Gentleman and Woman had taken the Medicines, would not the Erosions of their Stones have been attributed to the use of them? for I observe it is a matter of too great Moment, to let slip any *Hint* favourable enough to illustrate an Efficacy in them.

It is allowed here, as well as in other Places, that any Sediment or mucous Matter in the Kidneys or Bladder may be washed away by saponaceous Medicines; but that does not prove that he was entirely freed from his calculous Complaints, because the Stone was taken out of his Bladder in a Fortnight after. But whatever Ease he had, it is no hard Matter to account for it. The Man was very Old, and had *Palsy*, *Looseness*, and *Weakness*, all Signs of a *relax'd* Habit of Body; it is no wonder then, that just at the Period of his Life, the *Paralysis* should have become general,

neral, and Sensation be lost in the Bladder. Or if this Reason will not suffice, and that it be said the Medicines gave him that Ease, it could have been brought about but two Ways, as is before observed: 1. By increasing the Relaxation of all the Solids in this old relaxed Body; or, 2. by smearing over the Stone with the saponaceous Matter, and hindering its Pressure from being so sensible. I believe both were concern'd: the whole of his Case shews the first, and the Mortar Sediment, and the Softness of what is in this Case accounted the Surface of the Stone, seems to demonstrate the latter. As to the brown Coat, said to be generated between his leaving off the Medicines and his Death a Fortnight after, I leave to every Judge to determine (whether such an Encrease could happen in so short a Time, and almost in *Articulo Mortis*) without saying any more about it.

CASE



CASE XI.

The Case of ROBERT WOOD †.

‘ FIG. 5. and 6. represent a Stone
 ‘ taken from the Bladder of *Ro-*
 ‘ *bert Wood* by Mr. *Hawkins*. He was
 ‘ 68 Years old, infirm and asthmatical,
 ‘ and died of a Pleurisy, after he had
 ‘ taken the Medicines for about half a
 ‘ Year, in which Time he voided several
 ‘ Pieces. As to his Pains, they were
 ‘ rather less during his Use of the Me-
 ‘ dicines than before. The Manner in
 ‘ which the medicated Urine acted upon
 ‘ this Stone, is very singular; the upper
 ‘ Part being worn away into a sharp
 ‘ Edge, on each Side of which the se-
 ‘ veral Coats appear, whereas the lower
 ‘ Part seems almost untouched.’

T R E-

† *Supplement to the Views of the Pres. Evid.* p. 64.

R E M A R K S.

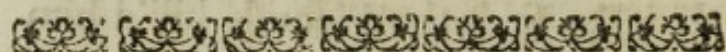
THere does not appear any thing particularly new in this Case, except that the Stone had Signs of being acted upon on one Side, and not on the other ; but, as we have shew'd elsewhere, the Appearance of Erosion is no certain Sign of the Medicines having done any thing, because that is common to other Stones where no Medicine is exhibited.

It is said above, that his Pains were rather less during the Use of the Medicines than before ; hence we find the Medicines extremely remiss in their Duty in this poor Man, neither easing his Pain, nor dissolving the Stone ; for "*rather less*" does not amount to a whole Degree of Comparison.

In short, Mr. *Wood* took the Medicines about half a Year, died, and being opened, had a Stone in his Bladder.

If it be said, the Pleurisy kill'd him before he had taken the Medicines long enough ; it may very naturally be answered, that half a Year is a long Season to be in the same Situation of Pain and other Inconveniencies, notwithstanding the Use of the Medicines all the Time ; and, as in other Cases, if he had lived out the other Half Year, the same might still be the Excuse, since it is allowed by Dr. *H.* that, in general, one cannot be certain what Time the Medicines will take up in making a thorough Cure.





C A S E X I I .

The Case of Mr. STANTON †.

‘ **F** I G. 12, 13, 14, 15, 16. repre-
 ‘ sent five small, angular Stones,
 ‘ with plain polished Sides, on which
 ‘ the Order of the Coats is visible. Mr.
 ‘ *Sharp* took them out of the Bladder
 ‘ of Mr. *Stanton*, who died suddenly,
 ‘ aged about 70. He had taken the
 ‘ Medicines for about two Months be-
 ‘ fore his Death, had received great Ease
 ‘ from them, and voided a few Scales.
 ‘ Now, as all Stones grow by the perpe-
 ‘ tual Addition of Coats quite round,
 ‘ it is evident these, in which the several
 ‘ successive ones are visible, and by Con-
 ‘ sequence the internal Structure ex-
 ‘ posed, must have been in a decreasing
 ‘ State.

R E-

† Supplement to *Views of the pref. Evid.* p. 65.

R E M A R K S.

THIS Patient has five polish'd Stones found in his Bladder after a constant taking the Medicines for two Months ; and because this, as well as other Cafes, makes greatly against any Efficacy in the Medicines, as to the dissolving Power ascribed to them, a Method must be found to palliate the Censure that must naturally arise from its Want of *Efficacy* here, and that is, that tho' the Stones were polished, yet there was a visible Decrease by an Appearance of its Coats. There can be no better Proof against a Decrease in the Stones, or the Action of Medicines upon them, than their being polished. It would be much a better Excuse upon finding a Stone but very little rough, to affirm it had been polished, but was made rough, (as is done elsewhere) by the Medicines ; tho' in other Cafes we have amply shewed there are white, brown, rough, eroded, scaly, &c. Stones in those who never took the Medicines.

Facile

Facile est inventis addere. Accidental Lines upon smooth Stones, may be compared to divers Things, one may fancy them like *Salamanders* or *Mere-maids*, as well as Orders of the Coats of the Stone itself, rubb'd off as if with a polishing Tool in the very Bladder. But be that as it will, it is plain the Man died, his Death was sudden, Stones were found.



From

From the Transactions of the
ROYAL SOCIETY, N^o. 462.
which, not coming to Hand
before all was printed off, oc-
casion'd this as an *Appendix*
only to the first of the Cases.

*An Account of the Case of William
Payne, with what appeared upon
examining his Kidneys and Bladder,
when his Body was opened; by Mr.
George Bell, Surgeon.*

‘ **W**ILLIAM Payne, aged about
‘ seventy-one, had been afflicted
‘ with the Stone in his Bladder, and
‘ other calculous Complaints, for feve-
‘ ral Years: He had taken Mrs. *Ste-*
‘ *phens's* Medicines for fifteen Months.

‘ He was subject also to a scrotal
‘ Rupture on the left Side, from which
‘ however he suffered no great Incon-
‘ veniency, unless upon Neglect of his
‘ Truss, which he had been directed to

‘ wear ; and’ even then, if the Intef-
 ‘ tines came down, he used to return
 ‘ them with Ease.

‘ About the Beginning of *January*
 ‘ last, he was attacked with a severe
 ‘ Fit of the Stone, attended, upon e-
 ‘ very Attempt to make Water, with a
 ‘ strong *Tenesmus*, that forced into the
 ‘ *Scrotum* a considerable Quantity of
 ‘ the Intestines, which exceeding his
 ‘ Skill to reduce, he sent for me. I found
 ‘ the Tumour large and unequal, but
 ‘ without much Tension or Inflamma-
 ‘ tion ; his Pulse low, with clammy
 ‘ Sweats ; he complained of violent
 ‘ Pains in his Back, propagated thro’ the
 ‘ whole Length of the *Ureters*, ac-
 ‘ companied with Nausea and Vomit-
 ‘ ings ; he felt exquisite Pain about the
 ‘ Neck of his Bladder and *Glans*, with
 ‘ an unusual Weight *in Perinaeo* ; he
 ‘ had frequent Inclinations to make
 ‘ Water, but seldom made above a
 ‘ Spoonful at once, and that Drop by
 ‘ Drop, with much Pain and sudden
 ‘ Stoppings : The Urine was extremely
 ‘ fetid,

‘ fetid, sometimes mixed with purulent
 ‘ Matter, at others, ting’d of a Coffee
 ‘ Colour.

‘ He had received just before I saw
 ‘ him, a Clyster, which produced two
 ‘ Stools, and encouraged me to hope,
 ‘ might facilitate the Reduction of his
 ‘ Rupture. I attempted it by all ne-
 ‘ cessary Means possible, but without
 ‘ Success: For altho’ the largest Part re-
 ‘ ceded and gave way, yet a considerable
 ‘ Portion remained, which I could not
 ‘ possibly return. I therefore conclud-
 ‘ ed, as the Intestines performed their
 ‘ Office, and were free from Tension,
 ‘ Inflammation, &c. that the Parts ad-
 ‘ hered; so left him, with Directions
 ‘ for a Bag-Truss to support them.

‘ *January* the 22d, being inform’d
 ‘ of his Death, I applied for Leave to
 ‘ open him, which was granted. In
 ‘ examining the Contents of the *Abdo-*
 ‘ *men*, I found the left Kidney quite
 ‘ wasted, scarce any thing remaining
 ‘ except the Coats, and those filled

‘ with Blood and purulent Matter; the
 ‘ *Ureter* very much enlarged above its
 ‘ natural Capacity, and full of the same.

‘ The right Kidney was ulcerated in
 ‘ several Places, and full of purulent
 ‘ Matter, mix’d with Grit, several Hy-
 ‘ datids appeared upon its external Sur-
 ‘ face; the *Ureter* was somewhat in-
 ‘ larged.

‘ I next examined the Bladder, which
 ‘ was exceeding large, and contained
 ‘ above three Pints of clear Urine;
 ‘ upon opening it and introducing my
 ‘ Hand, I found two smooth flattish
 ‘ Stones, somewhat larger than common
 ‘ *Windsor Beans*: I discovered a third
 ‘ in the Neck of the Bladder, which
 ‘ probably had been forced there dur-
 ‘ ing the Paroxysm, and appeared to me
 ‘ to be the immediate Cause of his
 ‘ Death: It was about the Size of a
 ‘ *Filbert*, and had quite corked up the
 ‘ Passage.

‘ Upon

‘ Upon dissecting the Hernial Bag,
‘ the first Part that presented was a
‘ large Piece of Fat, about half a Pound;
‘ and immediately underneath it lay a
‘ large Portion of the *Colon*, in Length
‘ about 10 Inches; the internal Surface
‘ of the *Peritoneum* was strongly at-
‘ tach’d to the *Colon* by several Fila-
‘ ments, and to the *Scrotum* by its
‘ cellular Substance.

‘ All the other *Viscera* were in a
‘ natural State.

Read Feb. 4. 1742.

F I N I S.



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