### CHAP. XIX.

#### OF ESCHAROTICS.

Escharotics are substances which erode or dissolve the animal solids. This they do, either by combining with the animal matter, and forming a soft pulp, or a species of eschar, or by a resulting affinity, causing the elements of the soft solids to enter into new combinations, whence their cohesion is subverted, and their composition is changed. In both cases the life of the part is destroyed. They are employed principally to remove excrescences, to establish an ulcer, or to change the surface of an ulcerated part, converting it into a simple sore; and the principal distinction among them is that founded on the energy of their action,some eroding merely the cuticle or external surface to which they may be applied, as nitrate of silver, or sulphate of copper; others, as potash, producing the decomposition of the animal matter to a much greater depth. The action of some of them too, that of arsenic for example, appears to be so far specific, that effects are obtained from their operation, not easily obtained from the others.

## ESCHAROTICS.

Acida mineralia.

Super-sulphas aluminæ et potassæ.

Potassa.

Nitràs argenti.

Murias antimonii.

Sulphas cupri.

Acetas cupri.

Murias hydrargyri.

Sub-nitras hydrargyri.

Oxidum arsenici album.

Juniperus sabina.

THE MINERAL ACIDS act rapidly as escharotics, especially the sulphuric and nitric acids; but, from their fluidity, they can seldom be conveniently applied.

Super-sulphas aluminæ et potassæ. Alumen. Alum. (Page 276.)

ALUM, from its excess of acid, has a degree of escharotic power; and under the form of dried alum, in which its water of crystallization is expelled, is sometimes used in fine

powder, to check the growth of fungous excrescences from ulcers. This powder, rubbed with a little sugar, is, from the same property, applied to remove opaque specks from the cornea.

Potassa. Potash. (Page 21. 372.)

Pure potash, in its solid state, forms a powerful escharotic, which has long been in use under the name of Causticum Commune Acerrimum. When its solution, before being evaporated entirely to dryness, is mixed with a portion of lime, its operation is rendered rather weaker: this preparation is named Causticum Commune Mitius. Either of them is made into a paste with soap, and applied to the part. This application is frequently employed to establish an ulcer, and sometimes in preference to incision to open a tumor: its action is attended with a considerable degree of pain, and a sense of burning heat; after it is removed, a cataplasm is applied, by which this is relieved, and suppuration established. Mr Simmons has recommended potash in preference to other escharotics, to prevent the effects from the bite of a rabid animal; it is applied freely to the bitten part; and the preventative operation of excision, he has supposed, may be rendered more certain by touching the surface with potash.

NITRAS ARGENTI. Nitrate of Silver. Causticum Lunare. Lunar Caustic.

This preparation is obtained by dissolving silver in nitric acid, evaporating the solution to dryness, melting the mass by a gentle heat, and while liquid running it into cylindrical moulds, in which, as it cools, it becomes concrete. It is the caustic which is in most common use for checking the

growth of fungous excrescences, or changing the diseased surface of an ulcer, a little of it being dissolved in as small a portion of water as is sufficient, and being applied by a pencil to the part.

MURIAS ANTIMONII. Muriate of Antimony. (Page 317.)

This preparation of antimony has been used as an escharotic, but being liquid, it is not easily confined to the part on which it is designed to act, and it has no particular advantage to recommend it.

SULPHAS CUPRI. Sulphate of Copper. Vitriolum Cœruleum. Blue Vitriol. (Page 217.)

This salt is a mild escharotic, and from this mildness of its operation is adapted to particular cases. Its solution in water is sometimes employed to change the diseased surface of sores, especially of venereal sores; and either in solution, or in powder mixed with any mild vegetable powder, it is applied to remove specks on the cornea.

SUB-ACETAS CUPRI. Sub-acetate of Copper. Ærugo Æris. Verdigrease. (Page 218.)

This preparation is in frequent use as an escharotic, principally to change the surface of foul ulcers, being applied under the form of ointment mixed with lard. In the same form, it is applied as a stimulant in some kinds of ophthalmia.

Offic. Prep.—Ungt. Sub-acet. Cupr. Ed. Dub.—Oxymel Æruginis. Dub. Lond.

MURIAS HYDRARGYRI CORROSIVUS. Corrosive Muriate of Mercury. (Page 204.)

This preparation of mercury is occasionally employed as an escharotic. Its solution in water, in the proportion of one grain to the ounce, is in particular applied to venereal ulcers. And still more dilute, it is sometimes used as a lotion to herpetic eruptions.

SUB-NITRAS HYDRARGYRI. Sub-nitrate of Mercury.—
(Page 202.)

This, the red precipitate of mercury as it has been named, has long been in common use as an escharotic, and as a stimulant application to foul and languid ulcers. Reduced to fine powder, it is sprinkled on the part, or it is applied mixed with lard in the form of ointment; for the preparation of which, a formula is given in the Pharmacopæias.

Offic. Prep. - Ungt. Sub-nitr. Hydrargyr. Dub. Lond. Ed.

OXIDUM ARSENICI ALBUM. White Oxide of Arsenic. (Page 220.)

White oxide of arsenic has been frequently employed as an external application to cancer, and though it has been regarded as in some measure specific, its immediate action is that of an escharotic. It was first introduced as an empirical remedy, and was applied, mixed with vegetable matter; a drachm of white arsenic, five scruples of sulphur, an ounce of the leaves of Meadow Crowfoot, and an ounce of Dogsfennel, being rubbed together, and a little of the powder being made into a paste with the yolk of an egg: this, in a few hours, formed an eschar, by which the diseased surface

was changed; and by exciting suppuration by the application of cataplasms, this was thrown off. It has since been used under the form of ointment or solution. The latter has been supposed the least painful form, though perhaps it is not the most effectual. Ten grains are dissolved in one ounce of water, and this solution is applied by a pencil to the sore. It not unfrequently amends the discharge, causes the sore to contract in size, and cases have even been related of its having effected a cure. Violent lancinating pain is sometimes produced by its application; and in some cases, from its continuance, the general system appears to be affected, and symptoms occur indicating affection of the stomach and lungs, which cannot be relieved but by suspending the application. When these appear, the use of the arsenic ought to be stopt: and the effects already stated under the general history of arsenic, (page 221.), as produced by its application to an wound, suggest the propriety of employing it with much caution even externally, especially when it is applied to an excoriated surface. Cases are on record, in which, from the too free application of it in this manner, violent constitutional symptoms, with even a fatal termination, have been induced. Still, even with these disadvantages, the benefit derived from the application of arsenic in scirrhus and cancer, has often been so striking as to lead to its occasional employment, especially with the view of reducing the size of a cancerous tumor or sore, or in those cases where either the patient will not submit to the operation, or where it cannot be properly performed. The original mode of applying it by cataplasm is probably the most effectual, as changing the whole diseased surface more perfectly.

JUNIPERUS SABINA. Savine. (See page 364.)

The leaves of savine possess an acrid power, whence they are employed as escharotic. The powder sprinkled on warts or excrescences removes them, by what kind of operation is not very obvious. When made into an ointment with lard, it is used as an application to old ulcers, and to some obstinate cutaneous affections: it has also been recommended as superior to any other stimulating application in exciting that degree of suppuration necessary to keep up a purulent discharge from an issue. This ointment has been received as officinal in the London and Dublin Pharmacopæias.

Offic. Prep.—Cerat. Sabinæ, Lond. Dub.—Ol. Sabinæ, Ed. Dub.

# FOURTH DIVISION.—OF MECHANICAL REMEDIES.

THE last subdivision of the classification includes those classes of remedies, the operation of which is merely mechanical. Under this I have placed Diluents, Demulcents, Emollients, and Anthelmintics. They are classes of comparatively little importance.

### CHAP. XX.

### OF DILUENTS.

DILUENTS have been defined, Substances which increase the fluidity of the blood, by augmenting the proportion of fluid in it. Watery liquors, it is obvious, will have this operation to a certain extent, and, strictly speaking, water is the only proper diluent. But different mild substances are added to it to render it pleasant, and frequently to communicate to it a demulcent quality, diluents and demulcents being generally employed to answer the same indications. With the former intention water is infused on scorched bread; or a decoction of bran is used. Gruel, which is a decoction of the grains of the oat, freed from their husk, is the most common lubricating diluent.