OUR PRIZE COMPETITION.

MENTION SOME OF THE CHIEF (PREPARATIONS OF OPIUM, WITH THEIR USUAL DOSES? WHAT ARE THE CHIEF SYMPTOMS OF AN OVERDOSE?

We have pleasure in awarding the prize this week to Miss J. G. Gilchrist, Gilmore Place, Edinburgh.

PRIZE PAPER.

Opium, with its peculiar properties, having narcotic, sedative, and astringent powers, is one of the most valuable remedies known in connection with disease and abnormal conditions.

Derived from the juice of the poppy capsule, cultivated in Turkey, Smyrna, and other countries, opium owes its chief medicinal value to its primary alkaloids morphine, codeine, and the different preparations and combinations of these with other drugs, secondary alkaloids derived being apomorphine and heroin.

The principal preparations are morphine hydrochloride, morphine acetate, morphine tar-trate; the tincture, liquid extract, and morphine solutions being the most used for internal purposes, hypodermic injections, and local

applications. The tincture, laudanum, contains 1 gr. of

opium in 15 minims; the dose is 5 to 15 minims if to be repeated, or a large dose of 20 to 30 minims may be given at once. It acts as a

From mist. opii is made linimentum opii, a few drops being sprinkled upon and wrung out with fomentations.

Camphorated tincture, or paregoric elixir, for use in chronic cough. Dose for an adult, ½ to 1 dr.; for a child, 4 minims.

A plaster, combined with resin. Opium, 1 in 10.

Ointment of gall and opium, used for painful hæmorrhoids.

Enema opii, ½ dr. tincture to every 2 oz. of media, usually the starch mucilage.

From extract are made pills and powders, such as soap and opium (pil. sap. com.); dose, 2 to 4 gr.

Lead and opium (pil. plumb. cum opio); 2 to

4 gr. dose.

800

Powders of ipecacuanha and opium (Dover's powder); 5 to 15 gr. dose, containing 1 part of opium in 10 of the powder; chiefly used in severe cases of diarrhœa, and as a hypnotic and diaphoretic in feverish attacks. From Dover's powder is prepared powder of kino and opium (pulv. kino com.); 5 to 20 gr. dose. Aromatic chalk and opium (pulv. cret. arom. cum opio); dose, 10 to 40 gr.

Suppository of lead and opium (sup. plumbi. com.); I gr. of opium in each.

Morphia draught contains I gr. opium in 100 minims; dose, 10 to 60 minims.

Linetus opiatus contains 1 gr. opium in 1 dr.; dose, 1 dr. three or four times daily, to be swallowed slowly; used in throat affections from incessant coughing.

Mist. chloroform and morphine; dose, 2 to 15 minims.

Suppository morphine, containing \frac{1}{4} gr. each. Morphine tartrate, from which is prepared hypodermic injection, containing I gr. of tartrate in 22 minims; dose, hypodermically, 2 to 5 minims. Other hypodermic preparations are heroin, containing & gr. in 5 minims; dose, 3 to 5 minims. Apomorphine; dose, 5 to 10 minims.

Heroin is very useful as a cough sedative; in the form of a pill, contains 12 to 1 gr.

Syrupus codeine is another preparation dose, ½ to 2 fluid dr.—which has been found useful. In diabetes, codeine phosphate is used to reduce the quantity of sugar present.

Opium is a constituent in many of the soothing syrups, and in certain medicines, such as

chlorodyne.

Opium is peculiarly poisonous to the child out of all idea of proportion, the chief dangers being congestion of the brain and blocking of the bronchial tubes with secretions.

Opium is chiefly used to induce sleep, relieve pain, and calm nerve excitement, in specific cases, as in insanity and mania, the hypodermic method being the most useful when the pain is excessive.

The action of opium diminishes secretion, except that of perspiration, which is intensified; arrests peristalsis in the bowel. An overdose may have an opposite effect. On the nervous system the effect is first stimulating, then depressing; the respiratory centre is quietened and depressed; the cardiac centre is the most resistant.

Symptoms of an overdose are, if slight, vomiting nausea, headache, and giddiness. The skin is white and cold; the face "pasty"; the expression apathetic; consciousness becomes markedly decreased, and sensation greatly dulled. There is great drowsiness and inclination to go to sleep, making no effort to respond when aroused. The pulse is feeble and often slow; the extremities become cold: pupils become contracted, the characteristic "pin-point" pupils always occurring in the earlier stages. In the later stages of morphia poisoning the pupil may become dilated, a sign that the poison is paralysing the vital centres. No true paralysis is present, but great lassiprevious page next page