## THE OMAHA SUNDAY BEE MAGAZINE PAGE



## Patching Up Our Bodies With Rubber-Just Like Broken Tires.

NUMBER of recent experiments by American and foreign surgeons have demonstrated that rubber may be used very effectively as a substitute for human tissues. There are not many substances which can safely be introduced into the human system, and the discovery that rubber can be thus utilized is therefore regarded as a very important ons, particularly as this substance is better adapted to surgical work than any other which has so far been used for this

tion between the filmy draperies by

Rather less markedly Eastern in

effect, though their inspiration is the

same, are the tea gowns whose skirt

fulness is arranged with two open-ings for the feet to be passed

through, quite a number of Paul

Poiret's models being thus made this

season. One is of soft satin of real

rose-pink shading, made in the

simplest way, and just held in at the

a heavy fringe of gold.

trimming, and, for once, the white

purity of the robe is untouched by the faintest suspicion of pink, the under slips being of white instead

of flesh-colored crepe de chine and

chiffon. But, then, to make up for

this, the loose, graceful coat which

is worn with the little gown, is a

slory of color, its outer ninon being

of vivid Mediterranean blue and the

lining of the same filmy fabric in an

equally brilliant fuchsia pink, which,

Hitherto, for instance, silver, platinum, gold, copper and aluminum have been relied upon almost exclusively to repair broken bones and unite severed vessels, but these metals are not only expensive, but difficult to work with. Rubber, on the other hand, is inexpensive and tends itself admirably to manipulation at the hands of the surgeon.

To what extent rubber piping may be used in the future to replace worn-out arteries or other defective blood vessels can only be conjectured, but several experiments along these lines

have resulted most satisfactorily. A few years ago Dr. Edward Sullivan, an American surgeon, introduced a rubber tube into a dog's body to replace the biliary ducts between the hepatic canal and the duodenum, and the substitution was entirely successful. Somewhat later a similar achievement was accomplished on a human patient in a case in which the bile duct had been destroyed, the rubber tube which was inserted serving the purpose of a bile duct very satisfactorily.

The Undress Gown of White Mull and All-Over Lace, Show-

ing the New Large Armhole.-By Paquin.

The danger of inserting a foreign body into the human system lies in the fact that the blood is very susceptible to such interference. If it comes in contact with any substance other than those which nature provides it almost invariably coagulates, and death necessarily follows unless the normal flow of the blood stream is soon restored. It has now been discovered, however, that no congulation follows the contact of human blood with rubber, and hence the use of this substance is deemed entirely safe.

The reason rubber proves so satisfactory is believed to be

because of its colloidal nature, and it possesses many other

fancy-dress attire.

For you cannot imagine anyone

taking their ease in a closely cling-

ing, shining sheath of ivory net cov-

ered completely with myriads of opalescent and Indian silver pail-

lettes, with here and there a definite

glint of gold. Just in front the skirt

certainly does open over a foam of

frills in leaf green chiffon, but, for

the rest, its slightly trained scanti-

characteristics of human tissue. Another very interesting demonstration of the value of rubber for surgical work was given by Dr. Alexis Carrel a few years ago when he removed a piece of the wall of the abdominal aorta of a dog and replaced it by a piece of rubber about an inch by an inch and a half in area. The rubber sheet was carefully sutured to the aorta and the union which followed was perfect. Fifteen months later the animal was examined, and it was found that both sides of the rubber patch were covered with tissue.

Sterilized pieces of rubber sponge have been used successfully by Dr. Fieschi, the well-known Italian surgeon, to close the aperture in inguinal ruptures, and no harmful effects have followed, and Dr. Delbet was similarly successful in the use of a sheet of rubber to repair the abdominal wall of another patient afflicted with hernia.

From the history of the various subjects who have been

thus treated with rubber it seems to be scientifically established that this substance may be used to an almost unlimited extent to repair human tissues, to piece together several yessels and eventually perhaps to replace entire organs.

Velvet,

yellow tulle is folded at the decollete

and drawn into the swathed satin

sash of the same yellow, into whose

bow ends just one more water lily is

All of which is undoubtedly very decorative and beautiful, but inas-

much as it is entirely tacking in the

comfort and the "allure" which

should be the chief characteristics

of the tea gown it is by no means an

ideal model for choice or copying.

carelessly fastened.

In the repairing of broken bones which fail to reunite naturally it has long been the custom to use plates of silver or platinum, which are riveted to the bone and become a permsnent part of the skeleton without any untoward results. Pieces of healthy hone have similarly been used to take the place of bone that has become diseased. Hard rubber may perhaps be found of value for this class of mechanical work, but its greatest sphere will be in the replacing and eking out of soft tissues.

Rubber lungs, rubber stomachs, even rubber hearts, are not deemed to be beyond the reach of the synthetic surgeons of the future, but for the present perhaps we shall have to be satisfied with the use of this valuable substance for reparative work, in which limited sphere it will undoubtedly prove of incalculable benefit to the human race.