



Fig. 3.—Barium enema examination of colon (post evacuation) on November 1, showing complete return to normal.

thrombosis, trauma or mechanical stasis—is rare in this age group.<sup>6</sup> In 1961 a young woman with a similar radiological picture was seen at this hospital but she was not, as far as is known, receiving hormones. It is likely that the question of a relationship between oral contraceptives and thromboembolic disease will eventually be resolved, but whatever the outcome, it behooves us all to search for and recognize vascular occlusion of the colon as a cause of “bloody flux” in young females as in older patients.<sup>7</sup>

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#### POSSIBLE PROTECTIVE EFFECT OF SELENIUM AGAINST HUMAN CANCER

To the Editor:

Sodium selenide greatly reduced the number of animals with tumours in several carcinogenesis experiments ( $P < 0.05$ ).<sup>1</sup> Similar significant reductions were seen with animals fed adequate selenium levels ( $P < 0.05$ ).

Selenium is known to occur widely in the water and foods of seleniferous regions, especially foods of animal origin such as milk, eggs and meat, as well as vegetables and cereal grains.<sup>2</sup> If selenium had an effect on public health, areas adequate or

deficient could be expected to show different disease incidences or death rates.

Kubota *et al.*<sup>3</sup> have analyzed different forage crops for selenium content in the United States. The 31 states with an average forage crop concentration of 0.06 p.p.m. or more had a significantly lower death rate for 1965 than the 17 states and the District of Columbia with a forage crop concentration of 0.05 p.p.m. or less ( $134.0 \pm 12.3$  vs.  $172.0 \pm 3.5$ ),  $P < 0.001$ . If age- and sex-adjusted death rates are used and the total populations of the two groups are compared, the high selenium states have a death rate of 156.5 including 171.5 for the male and 142.0 for the female. The low selenium states have a death rate of 179.0 including 191.0 for the male and 165.5 for the female.

Allaway *et al.*<sup>4</sup> have measured selenium levels in human blood from several cities in the United States. Ten cities or counties with populations of 40,000 to 70,000 show an almost perfect negative Pearson correlation co-efficient of  $r^1 = -0.96$  ( $P < 0.001$ ). The negative correlation indicates an inverse relationship between selenium blood levels and the human cancer death rates.

Although the selenium levels in forage crops have not been determined, selenium indicator plants have been found extensively in Alberta and Saskatchewan. The indicator plants have not been found in British Columbia, Manitoba, Ontario and Quebec. The human cancer death rate for 1966 in the provinces with selenium indicator plants was  $122.2 \pm 7.8$  while in the provinces devoid of these plants the human death rate was  $139.9 \pm 4.9$  ( $P < 0.1$ ). A complete report will be submitted later for publication.

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#### MEDICAL STENOGRAPHY

To the Editor:

The communication by Dr. W. B. Parsons on “Medical Stenography” in the issue of February 15 (*Canad. Med. Ass. J.*, 100: 351, 1969) was most enjoyable.

I cannot help but quote my favourite stenographic slip: “A nodule was palpated in the groin two fingers breadth above the public tubercle.”

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