Public Health and the Year of the Pig

Colin Binns, MBBS, PhD¹ and Wah Yun Low, PhD²

On our Zodiac journey through public health land, we arrive at the Year of the Pig. The swine population is estimated to be around 2 billion pigs in the world, with the majority in Asia. About 50% live in China, but they are very common throughout the Asia Pacific region, both in commercial and in village production.¹ Pigs have long been valued as a source of food, animals that existed on leftover human food and foraging, which they converted to meat in an efficient way. In some cultures, such as in the Highlands of Papua New Guinea and islands of the South Pacific, they represent wealth and prestige. A tribal chief was often appointed on the basis of his wealth in pigs, or you could use pigs for a bride price. However, in other cultures pigs are associated with religious taboos and these need to be respected. Pigs are an important part of the world’s food resource, a good source of high-quality protein, and a useful source of other nutrients. World production is expected to continue to increase.² The nutrient content of pork will vary according to the cut of meat, age of the pig, and its feeding history. Pig meat is a very good source of protein and some of the B vitamins, but it does contain more fat than chicken. Pigs are an important source of protein and energy in our region, but the amount of fat in their meat, particularly when produced commercially, is of concern with increasing obesity in our region due to excess energy intake.

Pigs are associated with a number of public health issues. As with many other animals in commercial production, antibiotics are often used too frequently in pigs. The use of antibiotics as growth promoters and to control infectious disease outbreaks can lead to antibiotic-resistant strains emerging, which can be transferred to humans.³ There are similar considerations about the use of antibiotics in pig farming as in the poultry industry, although progress is now being made in the reduction of their excessive use.³⁻⁵

Pig tapeworm (Taenia solium) is an important parasitic infection in Asia, particularly in lower income countries, with poor public health care and sanitation. In humans, the larval cysts of the tapeworm (cysticercosis) can be deposited in muscles, and if in the brain they induce symptoms