

(including water). These are termed Nutrients, and the composition of the three classes of organic compounds is roughly as follows :

	Albuminoids.	Fats.	Carbo-hydrates.
	Per cent.	Per cent.	Per cent.
Carbon.....	53.0	76.5	44.0
Hydrogen.....	7.0	12.0	6.0
Oxygen.....	24.0	11.5	50.0
Nitrogen.....	16.0	None	None
	<hr/> 100.0	<hr/> 100.0	<hr/> 100.0

These Nutrients are by no means equally distributed throughout the food materials. The animal foods—meats and fish—while very rich in albuminoids and fats, possess but traces of the carbo-hydrates. They may be considered, therefore, essentially nitrogenous. Vegetable foods as a rule contain a large percentage of Carbo-hydrates, starch and sugar, and small quantities of albuminoids and fats, and consequently may be considered as essentially non-nitrogenous. An exception to the latter is to be found in peas and beans, which contain a notable amount of albuminoids. Very fat meats on the other hand, by reason of the large amount of fat they possess, cannot be considered as highly nitrogenous.

This great distinction between these classes of foods is one worth remembering as helping us to arrive at their true nutritive value. To enable us to do this the better, however, we may now proceed to state the physiological functions of these nutrients, whether they be derived from animal or vegetable foods. For this purpose I shall take the liberty of placing before you another chart from the National Museum.

USES OF FOOD IN THE BODY.

Food supplies the wants of the body in several ways. Food furnishes:

1. The materials of which the body is made.
2. The materials to repair the wastes of the body and to protect its tissues from being unduly consumed.

Food is consumed in the body as fuel to

3. Provide heat to keep it warm ;
4. Produce muscular and intellectual energy for the work it has to do