

### III. Trends in the Evolution of Physical Education

During the middle of the 19th century the dominant interest of scientists was focused on biology. Soon biological theories were applied to the field of the social sciences. Recreation and play activities biologized themselves with an over emphasis of the physical benefits to the individual organism. As an offshoot of biology came psychology with interest in the nervous system and the stimulus response mechanism. This too focused the attention on the physical structure of the organism with implications on the mental workings and the emotional meanderings. Physiology assisted both biology and psychology to penetrate the realm of biochemical reactions within the organism via the analysis of the gaping and the ductless glands, valences, and autonomic activities. Not until the turn of the twentieth century did the so-called scientists see much relationship between the organic tools of the homo sapiens and their extended, meta-organic or the superorganic tools known as culture. Since the emergence of cultural interpretation of human behavior, physical education has made an unprecedented metamorphosis by shifting its axis from the physical sciences to that of cultural or the social sciences. Today physical education and its two sisters, health education and recreation, have become master riders on two horses, the physical and the social, sciences, at the same time.

The shift from the physical to the socio-cultural bases on the part of health, recreation, and physical education is revealed in many ways.

(1) Work Complex. Puritanic and pioneering Americans idealized work habits in their early history. There were trees to fell, stones to cut, canals to dig, buildings to erect, Indians to subdue, lands to cultivate, communication