Semester-I
Zooacor02p: life table

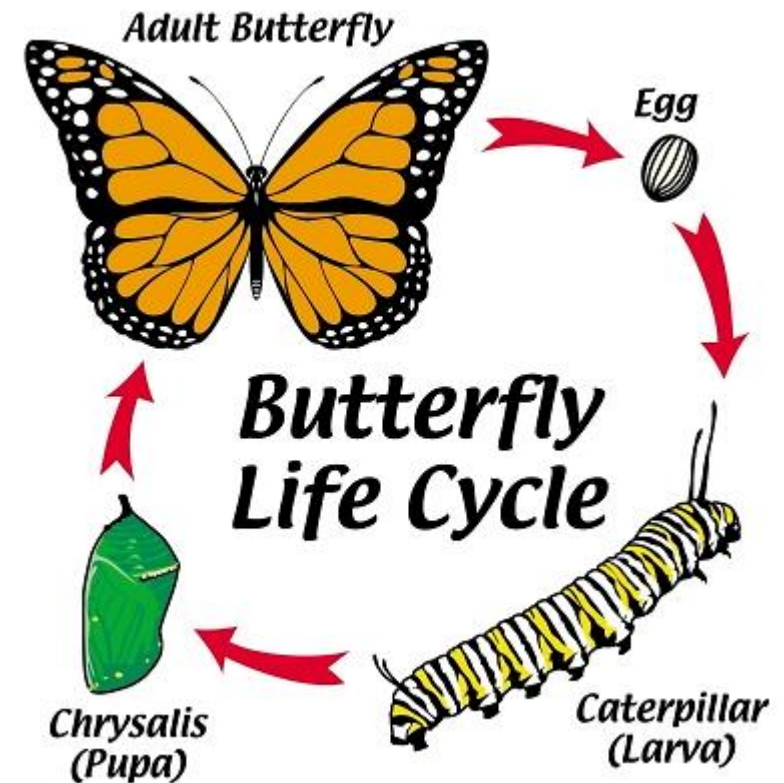## Unit-1 : Study of Life Table

RM

Dept. of zoology

hmmcw

Population (and its demography) has four chief property: Age Distribution, Mortality, Biotic potential and Carrying Capacity

- Mortality: Mortality refers to death of individuals in the population. This is antithesis of natality.

- Mortality better expressed in terms of Survival or life expectancy (= the average number of years to be lived in future by members of a population)

- Important Features of Mortality is Two

- Life Table and Survivorship Curves

- These two gives a clear and systematic picture of mortality in a population.

Life table: This is a table of probabilities dealing with death rate and expectation of life at various time-intervals (age group) over an organism life-span in a population.

The complete life table from the preceding data would be as follows:

Developmental Stage	Number Alive	Mortality Factor(s)	Number Dying	Percent Mortality
Egg	200	predation	100	50
Larva	100	parasitization	90	90
Pupa	10	freezing	6	60
Adult	4	(2 females and 2 males if sex ratio is 1:1)		

Adult Butterfly

Egg

Butterfly Life Cycle

Chrysalis (Pupa)

Caterpillar (Larva)

Life table comprises a series of columns :

Age in years (x)	Observed no of birds alive (nx)	Proportion surviving at start of age interval x (lx)	No dying within age interval x to x+1 (dx)	Rate of mortality (qx)
0	115	1.0	90	0.78
1	25	0.217	6	0.24
2	19	0.165	7	0.37
3	12	0.104	10	0.83
4	2	0.017	1	0.50
5	1	0.009	1	1.0
6	0	0.0	-	-

Life Table of Song Sparrow