

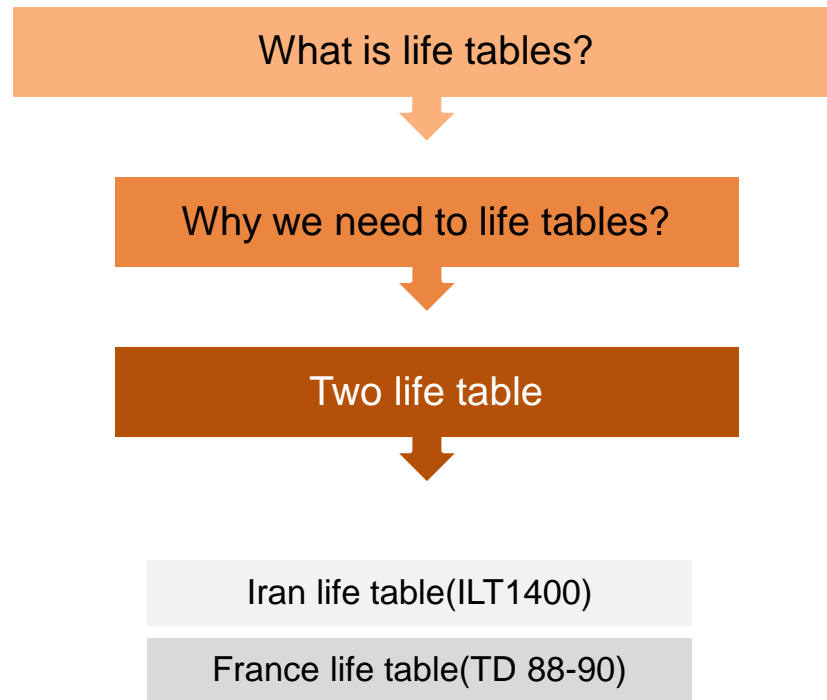


# **risk management and insurance**

Life Tables

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# SUMMARY



# Important Definitions

We need to these definition for understanding the life tables.

$${}_tp_x$$

- is the probability that *a person with age  $x$* , survives to at least age  $x + t$

$${}_tl_x$$

- Number of lives persons with age in this interval =  $(x, x+t)$

$${}_tq_x$$

- is the probability that a person with age  $x$ , dies before age  $x+t$

$${}_td_x$$

- Number of death at ages in this interval =  $(x, x+t)$

# History of life tables

## who finds it for the first time?

- To two Fellows of the Society, John Graunt (elected 1663) and Edmond Halley (elected 1678), the world owes the invention of that powerful vital-statistical instrument, the life table or table of mortality, but the respective shares of these men in the discovery is a matter of dispute.

## An image of life tables and some plots.

- [Click here](#) for the first life table
- Click for [Iran](#) and [France](#) [life tables](#)
- [Click here](#) for showing the Plots

# End

Thanks For Your Attention