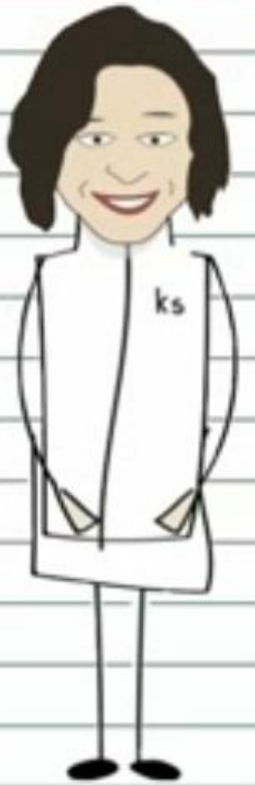
Week Two

Pulling it all together



How

When

DNA errors occur

impact

1.

How DNA errors occur

- Errors in separation = Segregation errors
- Errors in swapping = Recombination errors
- Errors in copying = Replication errors

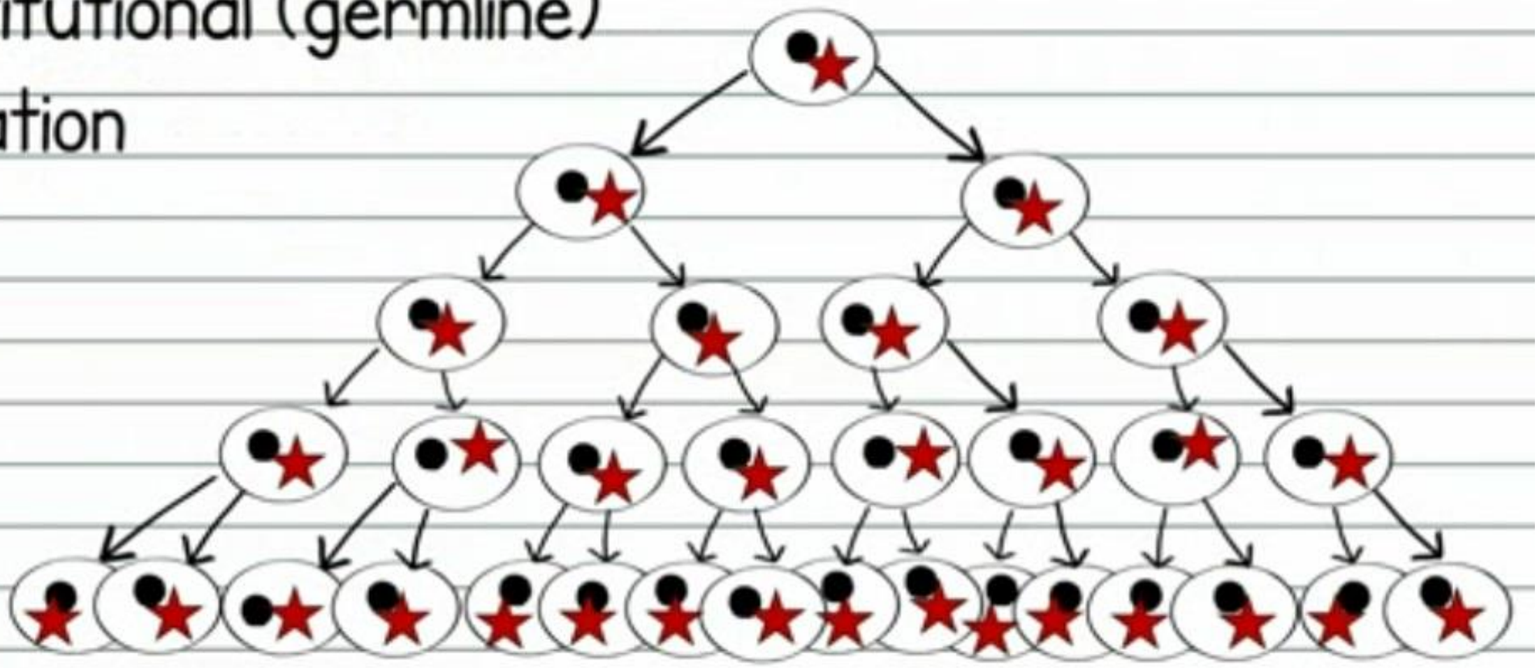
2.

When DNA errors occur

- All cells =

  constitutional (germline)

  mutation



2.

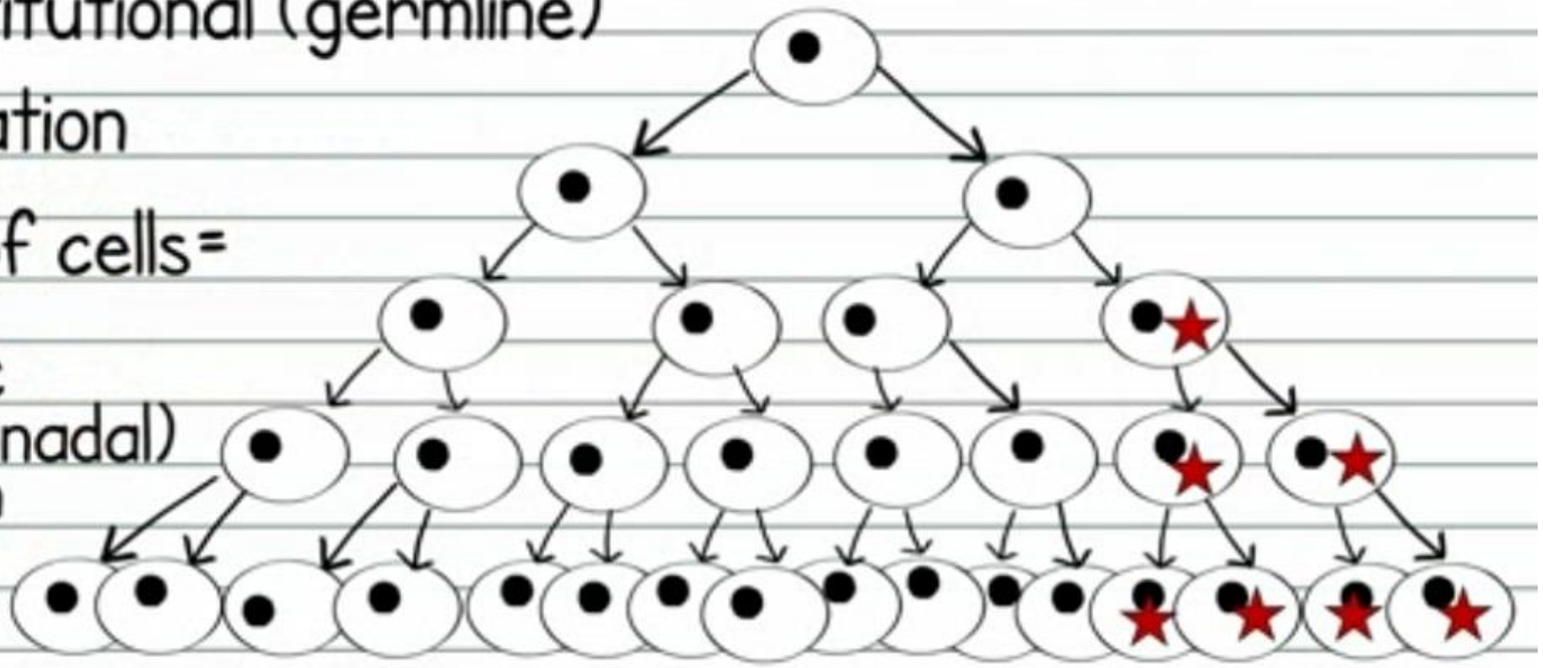
When DNA errors occur

- All cells =

  constitutional (germline) mutation

- Subset of cells=

  somatic (somato-gonadal) mutation



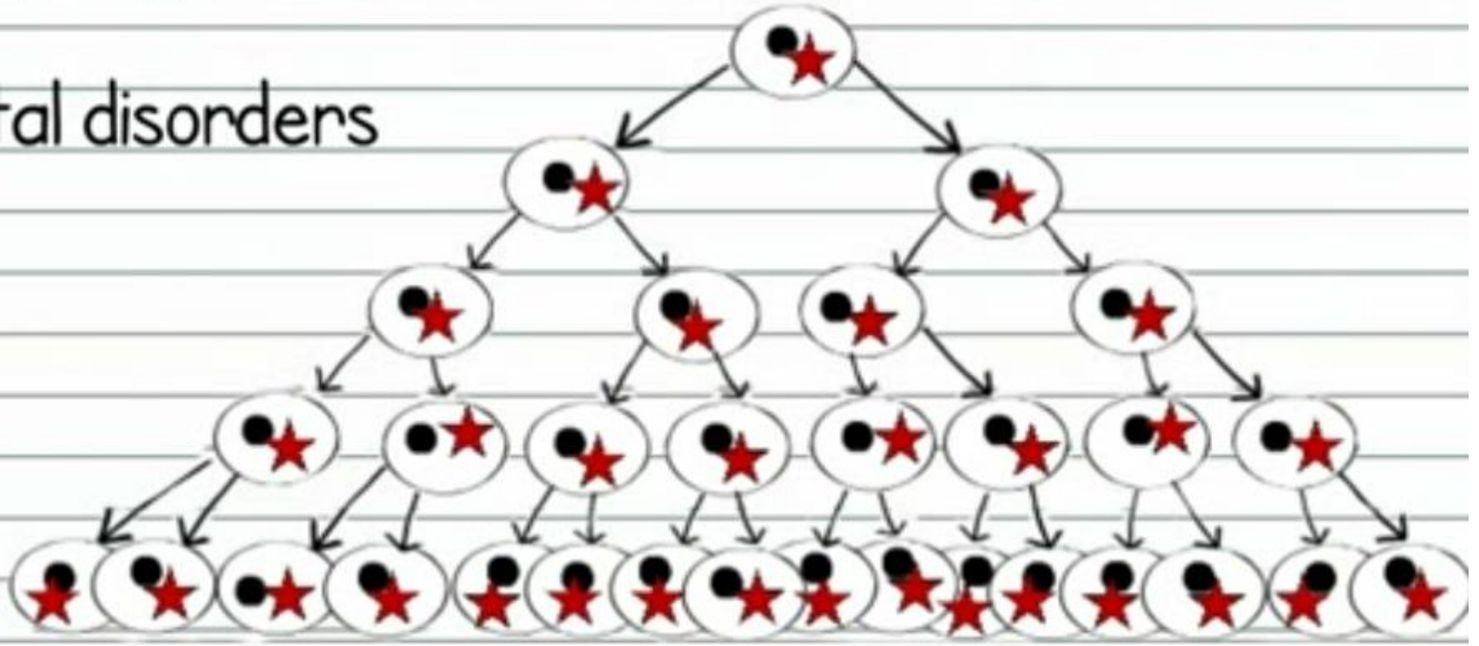
3.

The **impact** of DNA errors

- Constitutional errors:

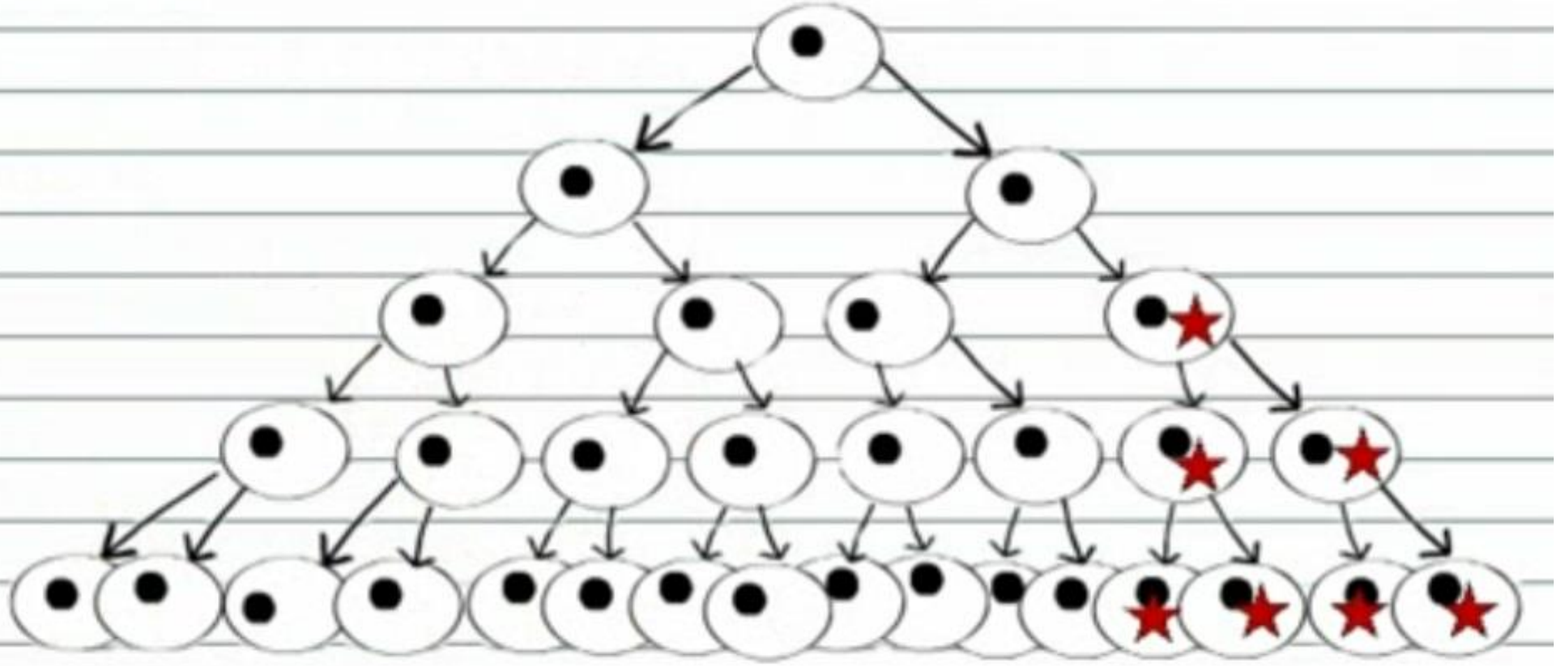
-Inherited conditions

-Developmental disorders



3. The **impact** of DNA errors

- Somatic errors:
  - -Mosaic conditions
  - -Cancer



Key words

Errors

Swapping = Recombination

Copying = Replication

Separation = Segregation

Mosaicism

Somatic errors

Mosaic conditions

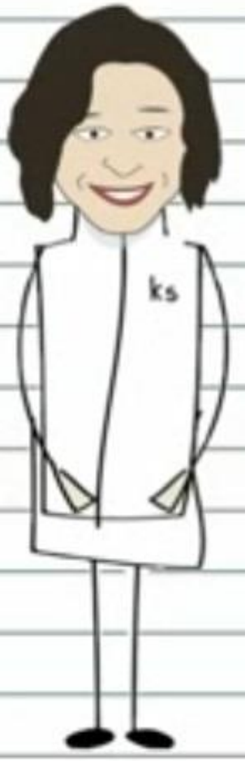
Cancer

Constitutional mutation

Constitutional errors

Developmental disorders

Inherited conditions

Come back for Week 3 -

"The changing genomic landscape"