

*Mismatch repair protects against γ -rays in *C.elegans**

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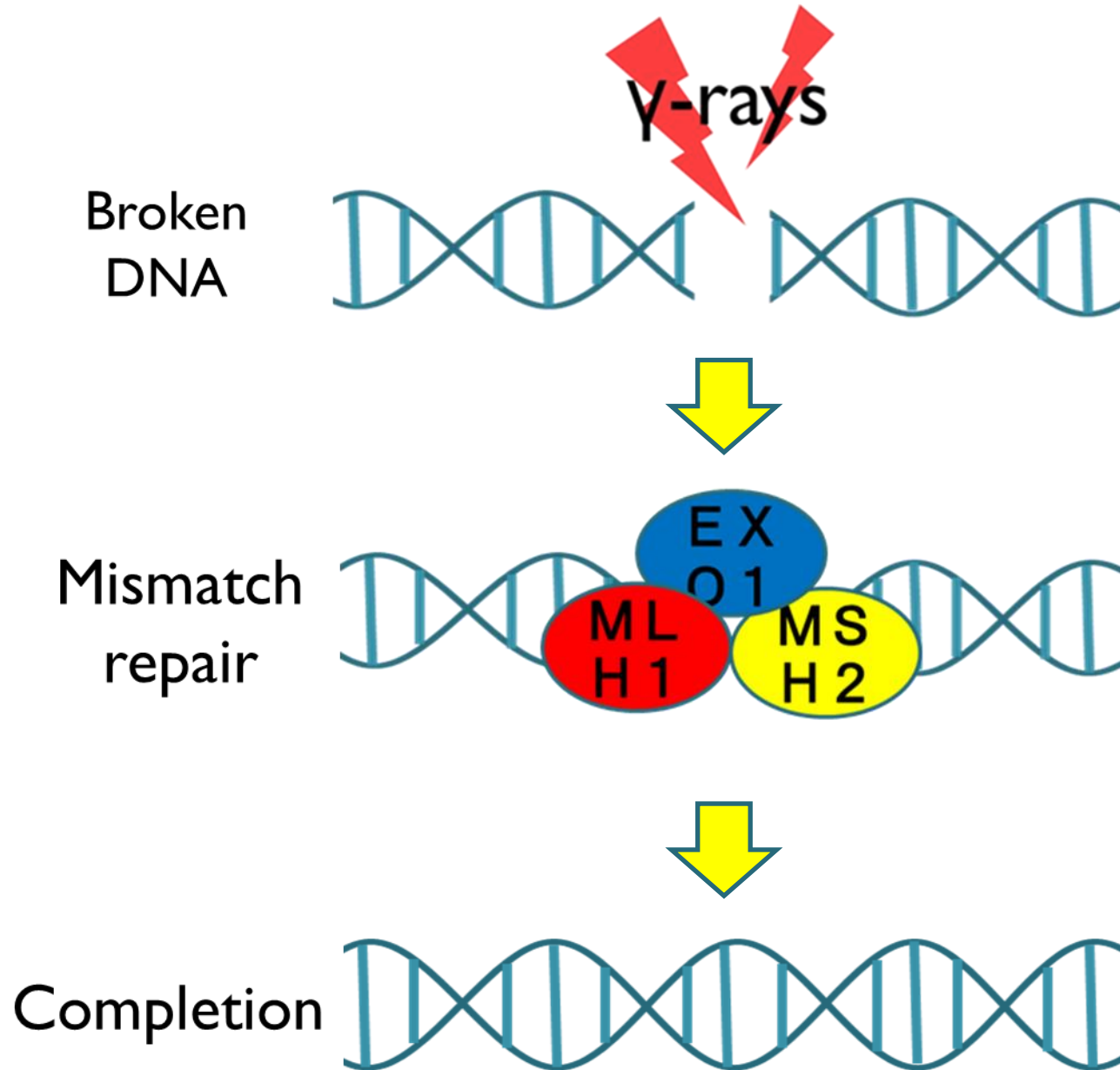
[http://www.wel.iwate-u.
ac.jp/shingai/worm.html](http://www.wel.iwate-u.ac.jp/shingai/worm.html)

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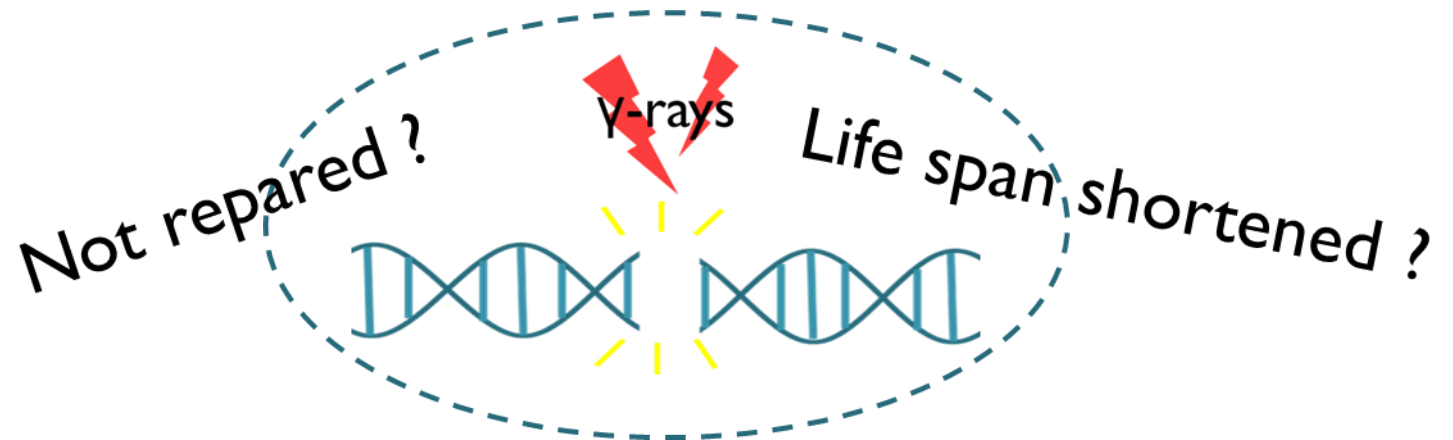
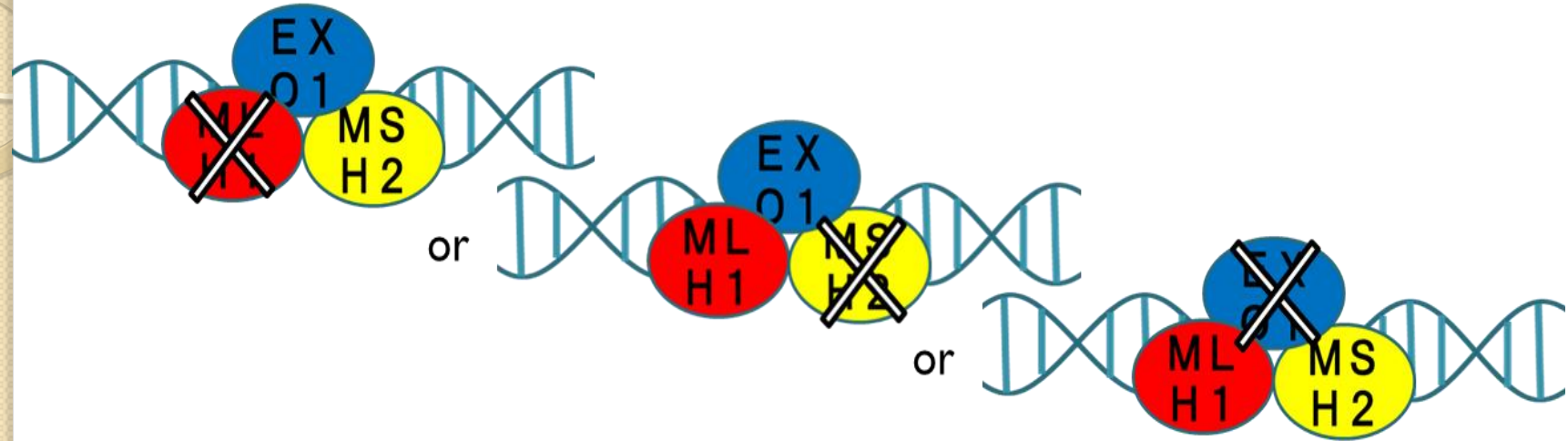


Introduction: What is mismatch repair ?

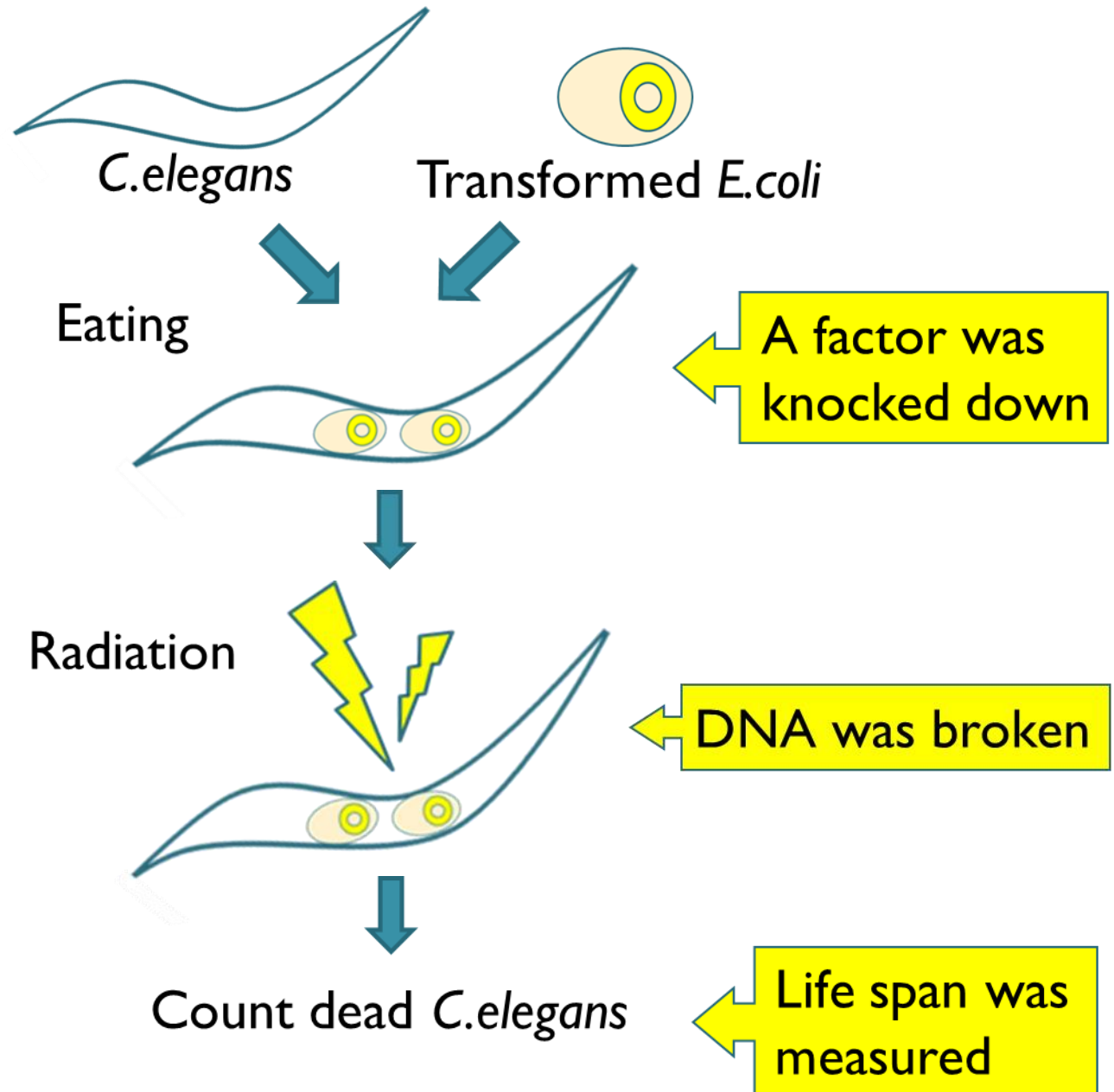


Introduction:

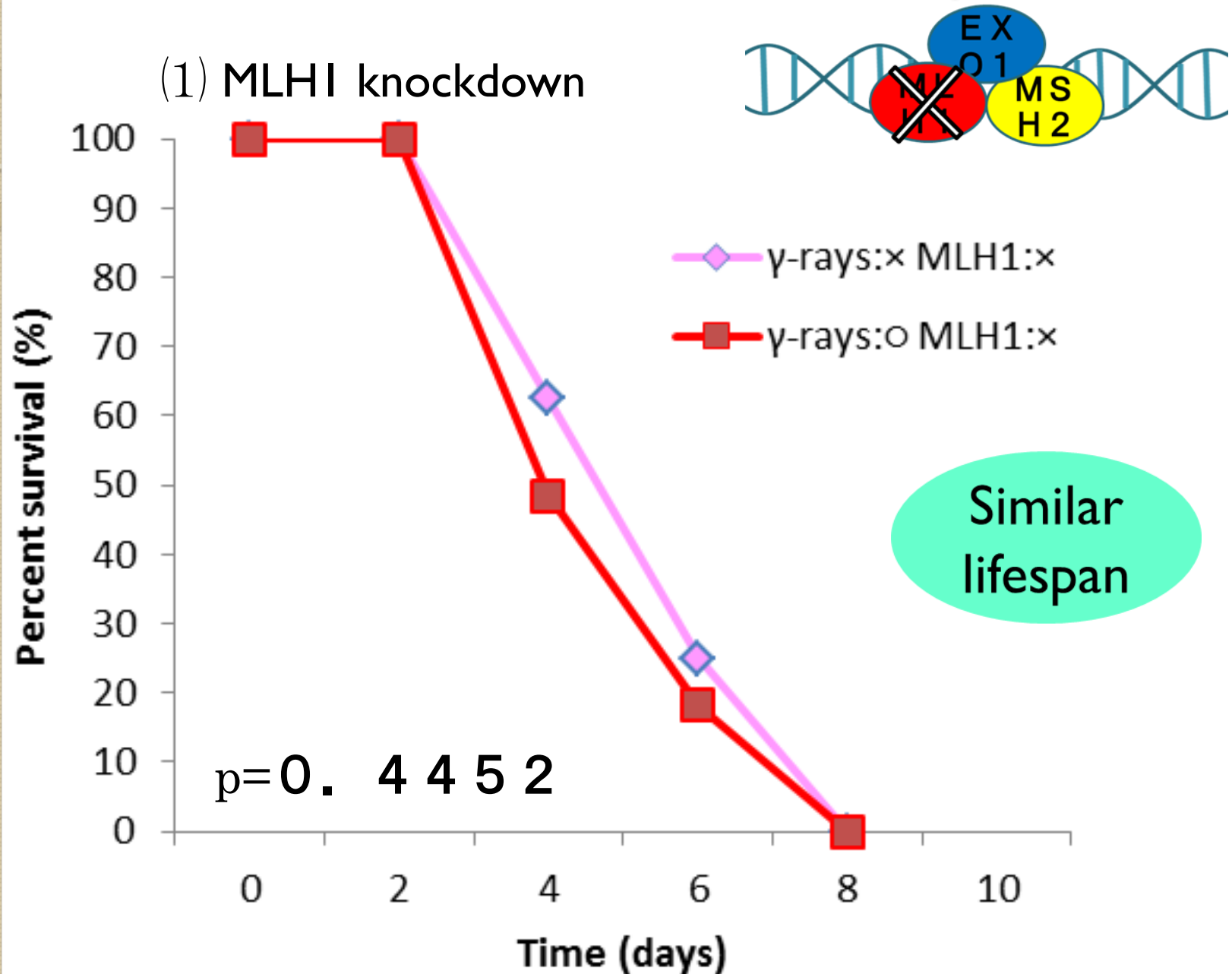
What was examined in this experiment



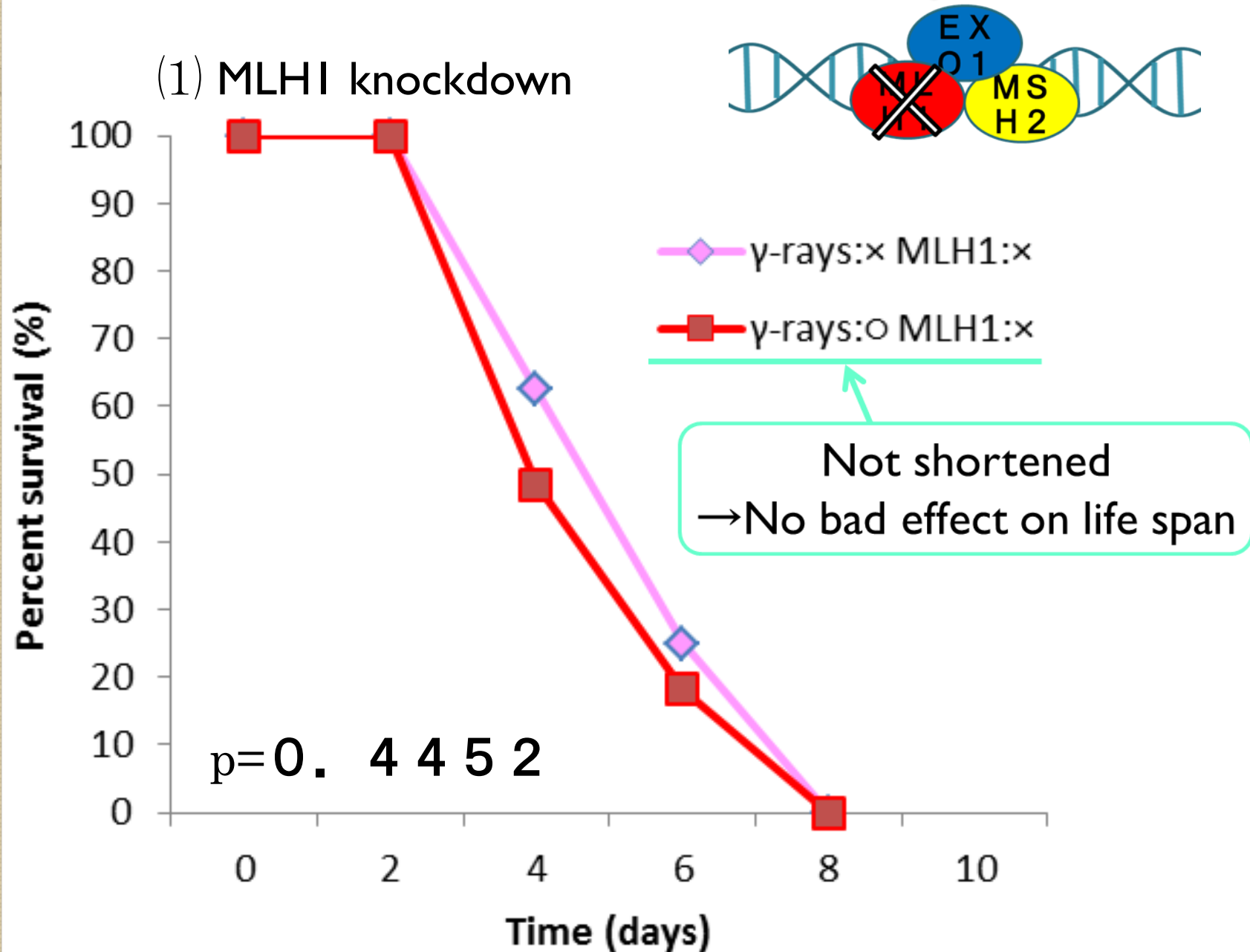
Materials and Methods



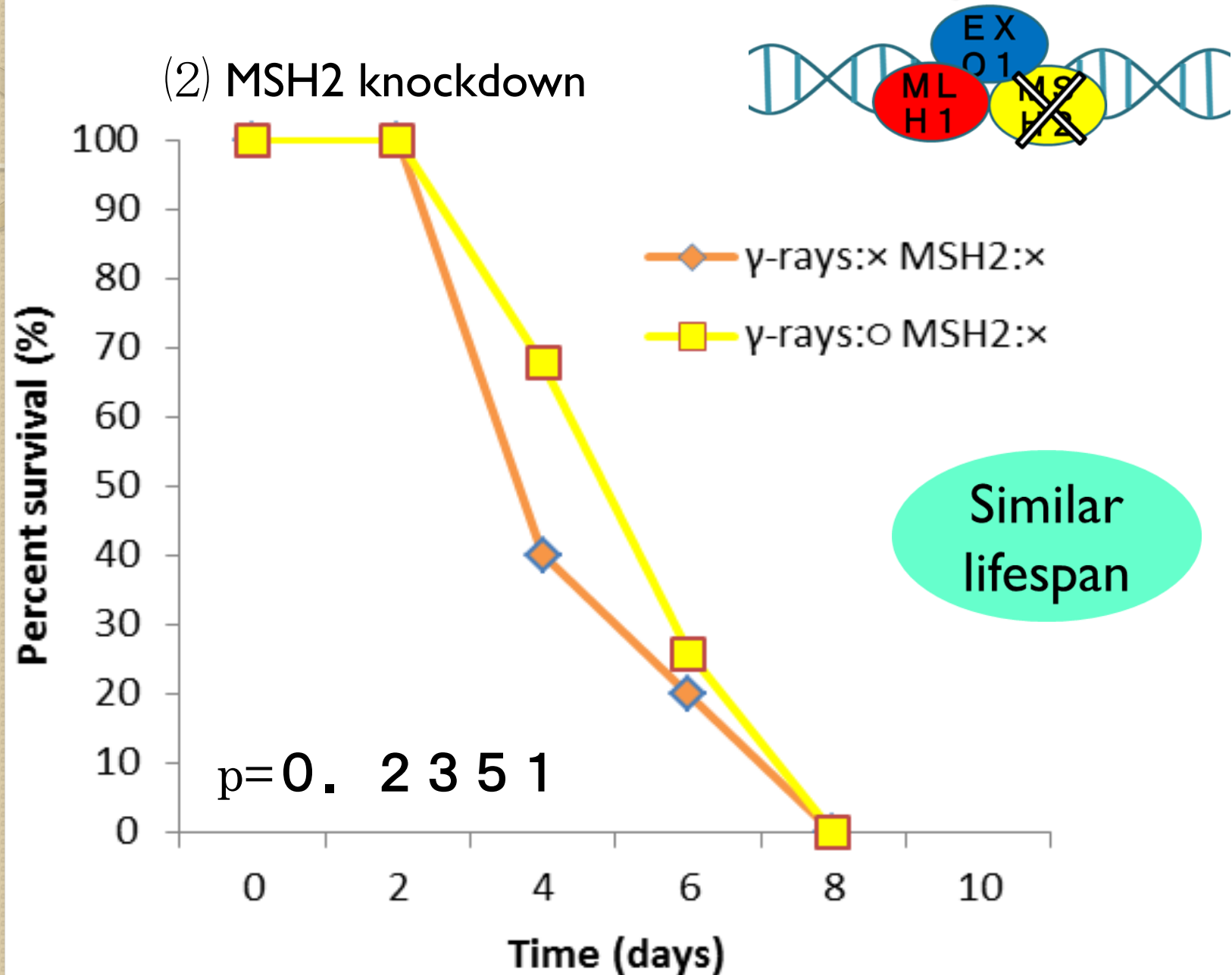
Results: Percent survival after γ -rays radiation



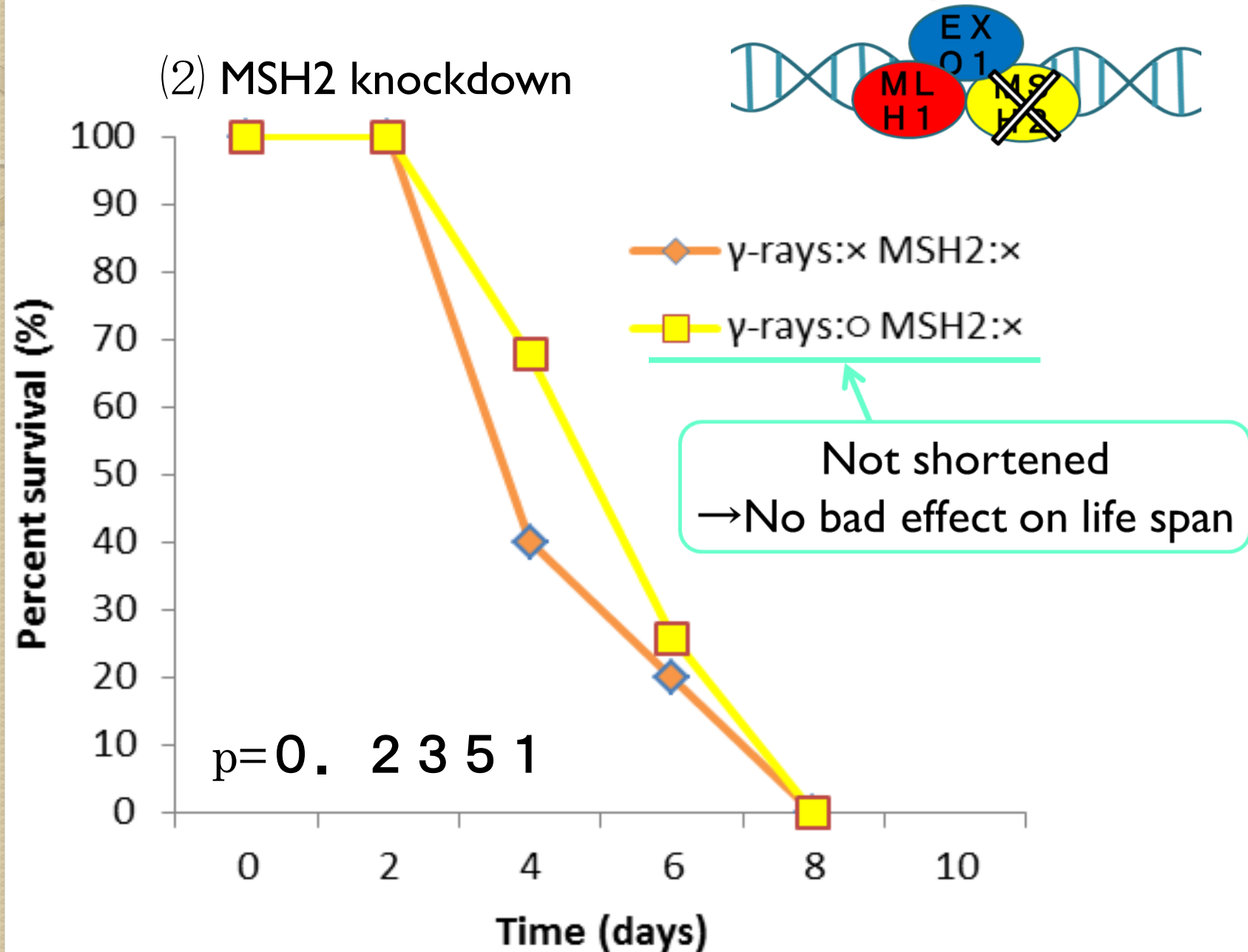
Results: Percent survival after γ -rays radiation



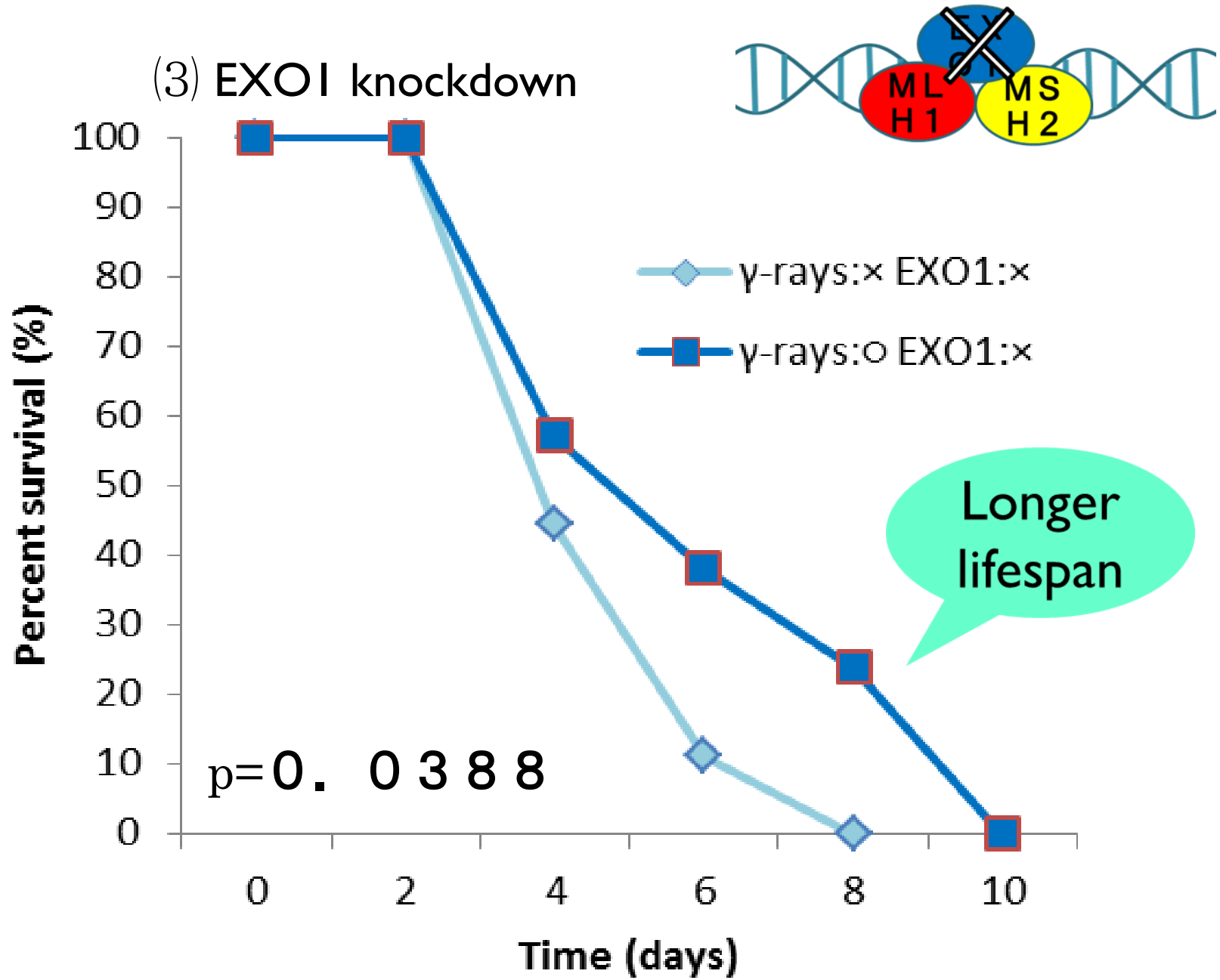
Results: Percent survival after γ -rays radiation



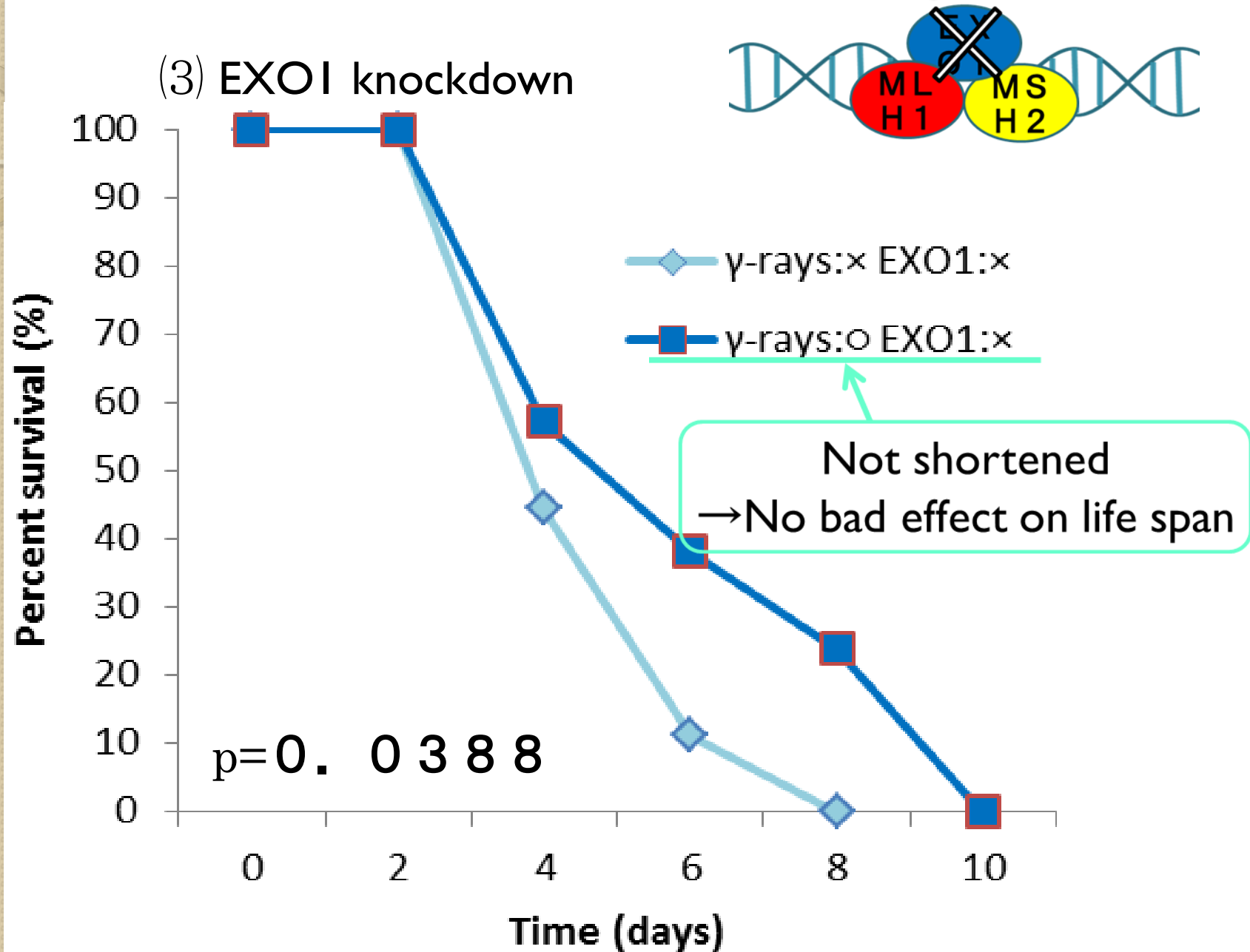
Results: Percent survival after γ -rays radiation



Results: Percent survival after γ -rays radiation



Results: Percent survival after γ -rays radiation



Conclusion

Life span was not be shortened
by MLH1/MSH2/EXO1-knockdown
(DNA was damaged by γ -rays)

Cancer

Backup
system

Another
mechanism

*Mismatch repair
protects against γ -rays in C.elegans*

Evolution

Resistance

Aging



Thank You For Your Listening !