



Test Automation (Regression testing)







1 What?

Why?

How ?

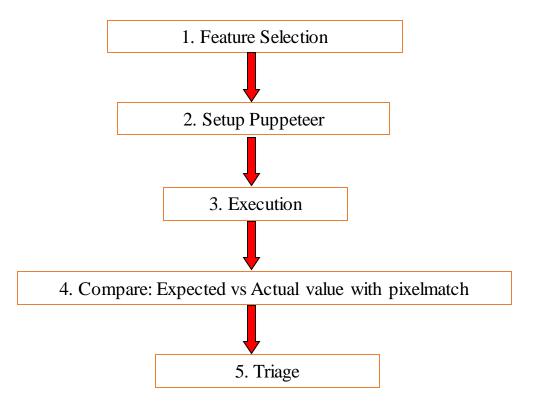
What?

Regression testing ensures that changes have not broken old features.

Why?

- Lower Cost
- Higher Quality

How?



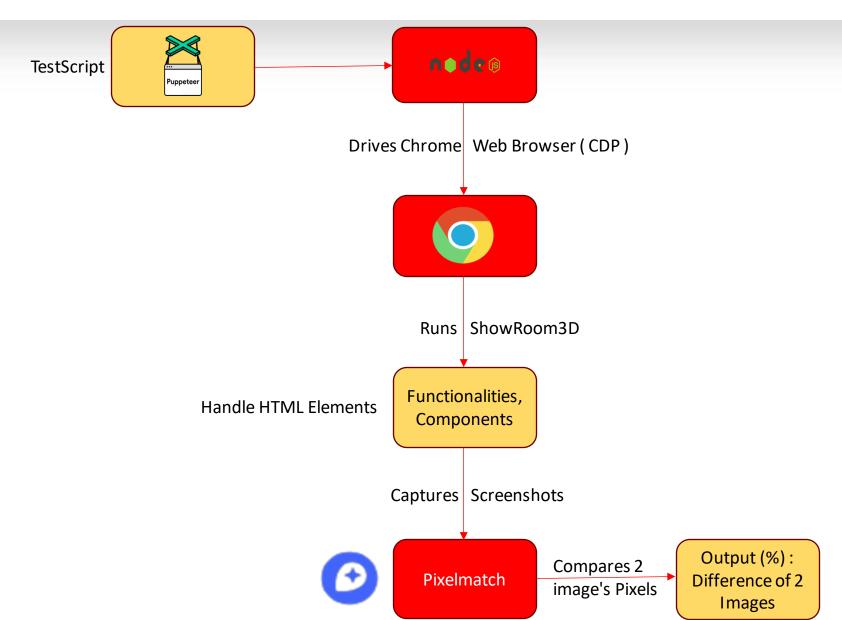
Puppeteer



- 1. Control web browser (e.g. Google Chrome).
- 2. A nodejs <u>library</u>.
- 3. Adopted by threejs & model-viewer.

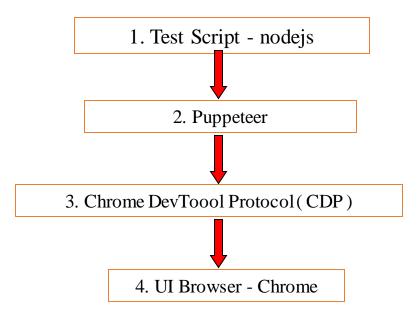
Puppeteer





Puppeteer







- 1. The Javascript pixel-level image comparision <u>library</u>.
- 2. Accurate pixel detection and Perceptual color difference.
- 3. Thresold ranges between 0 to 1 (Smaller thresold value = more sensitive comparision.)



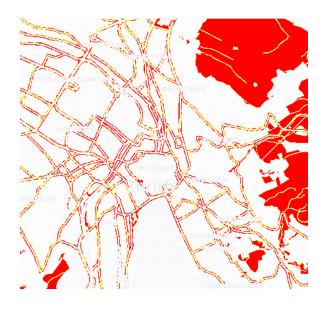
Comparision Example



Expected



Actual

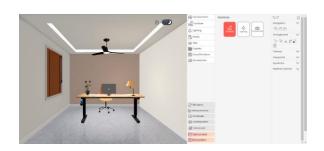


Difference = - 12.38 dB Similarity = 94.22 %



Comparision Example (Furniture – Diff)







Expected

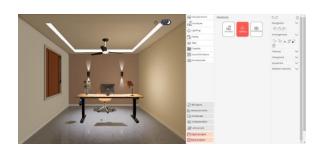
Actual

No Difference



Comparision Example (Furniture with lighting – Diff)







Expected

Actual

No Difference



Comparision Example (Sample Room with minor change – Diff)







Expected

Actual

Difference = - 13.98 dB Similarity = 96 %



Comparision Example (Sample Room with high change – Diff)







Expected

Actual

Difference = - 9.18 dB Similarity = 87.93 %