

Akú farbu majú hviezdy?



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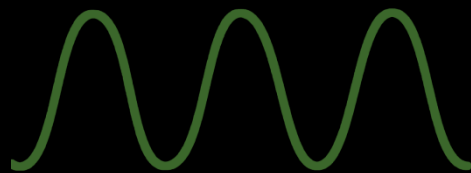
SVET

SWEET

SWET



lámat' svetlo



robit' vlny



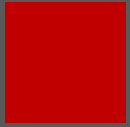
chytat' fotóny



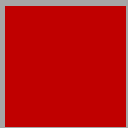
svetlo



svetlo



svetlo



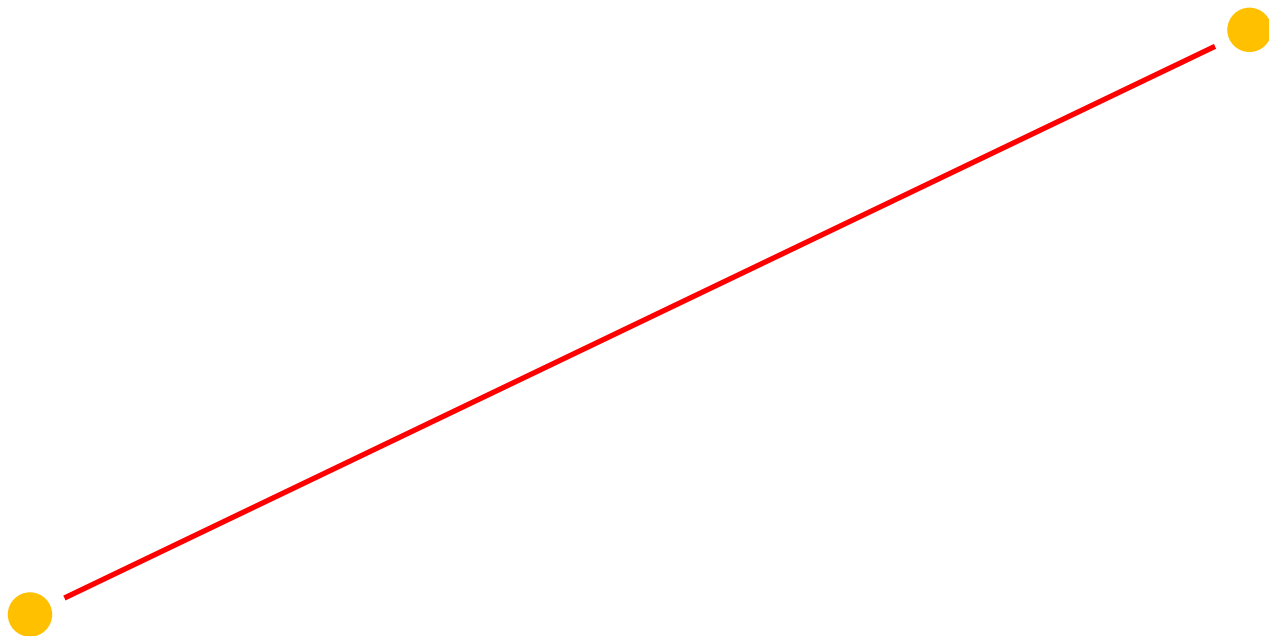
svetlo



svetlo

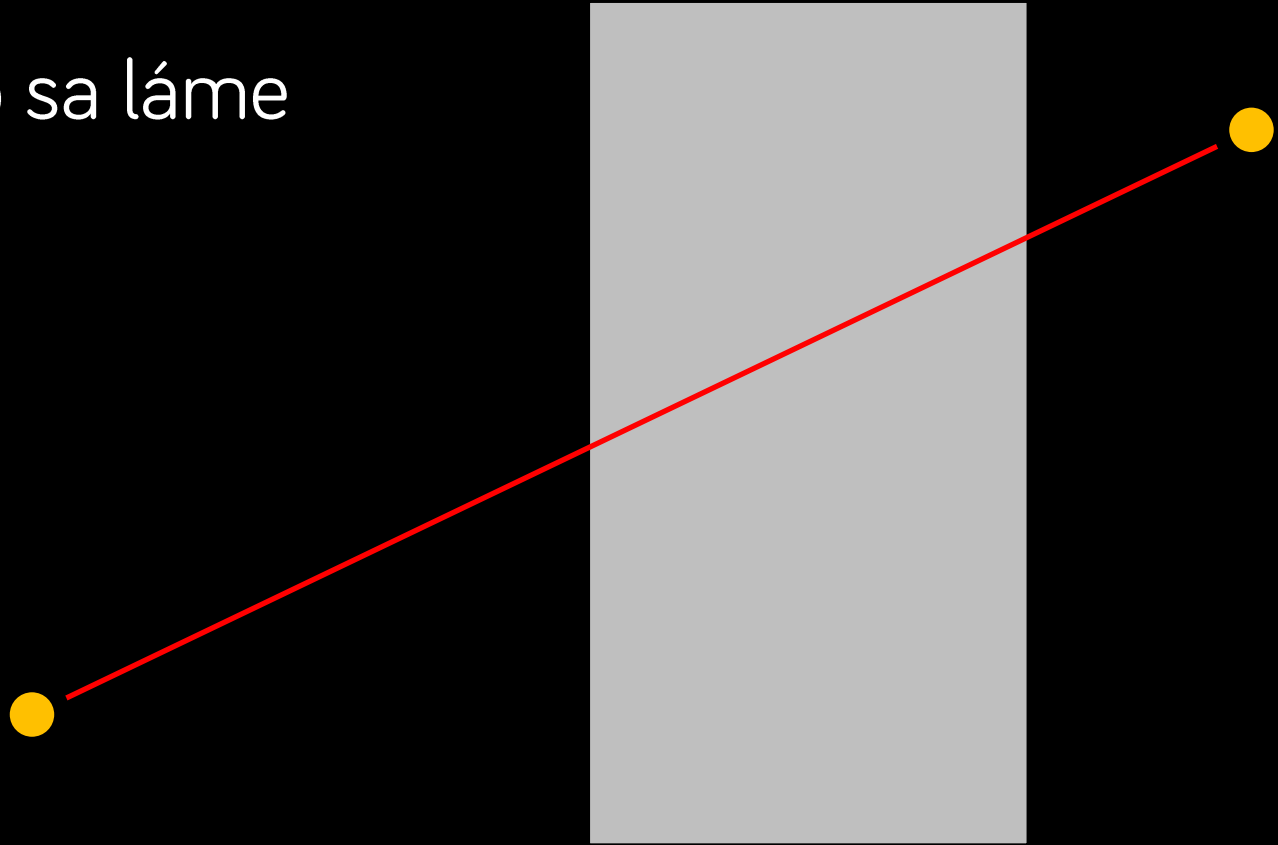


svetlo



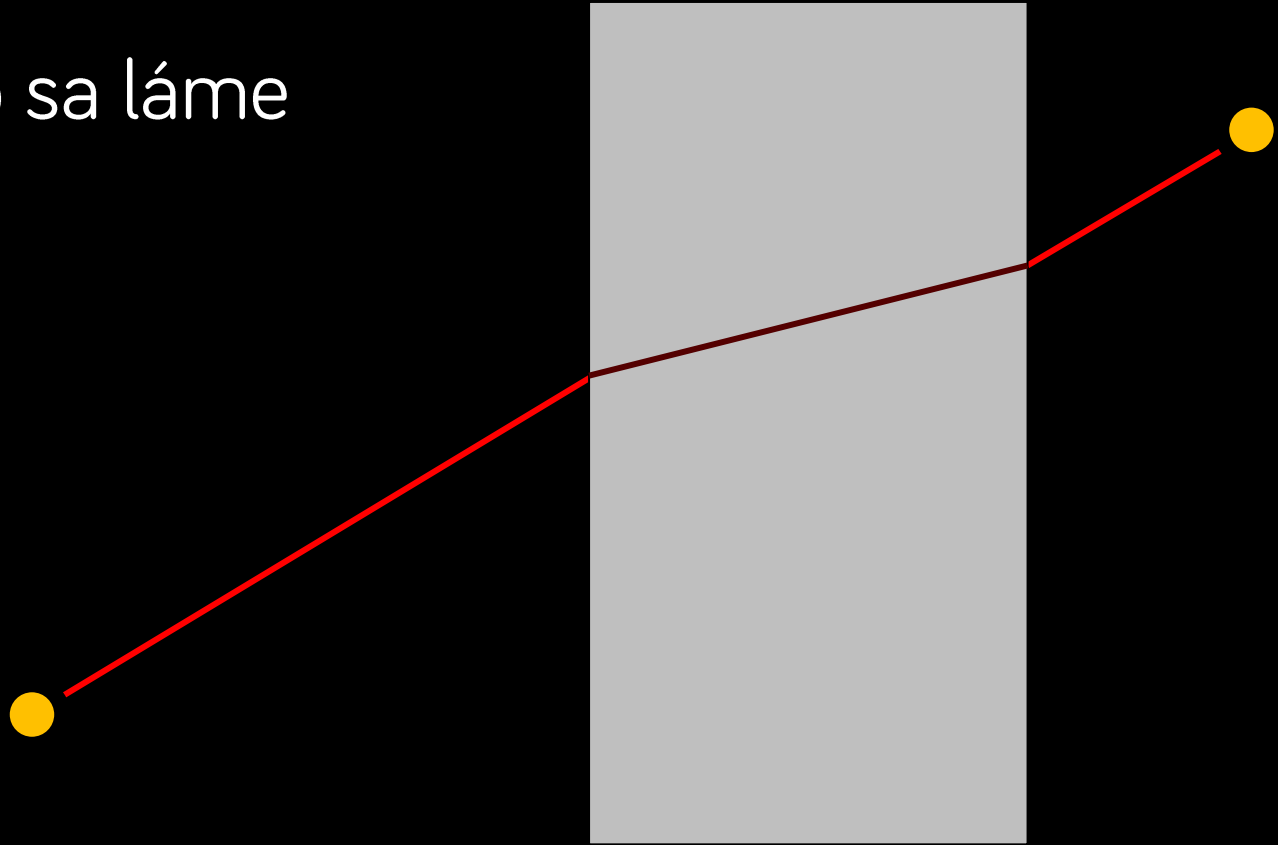


svetlo sa láme



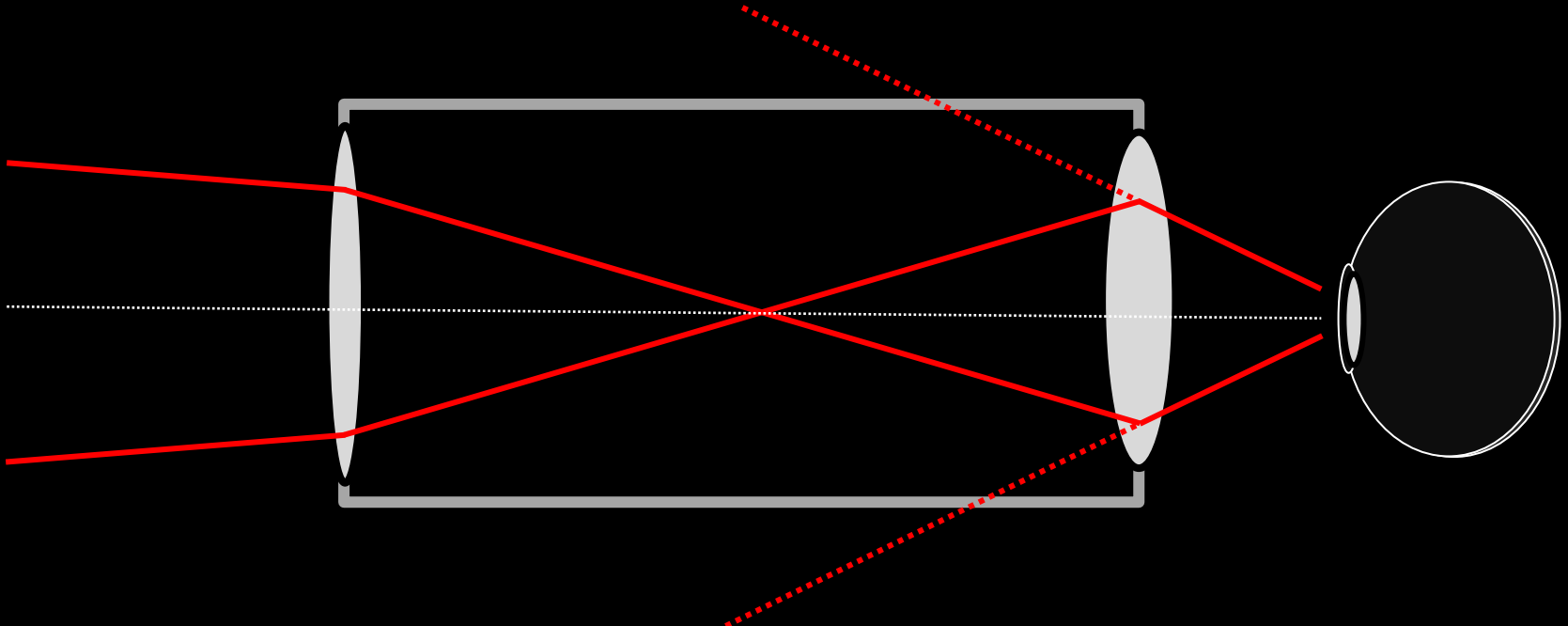


svetlo sa láme



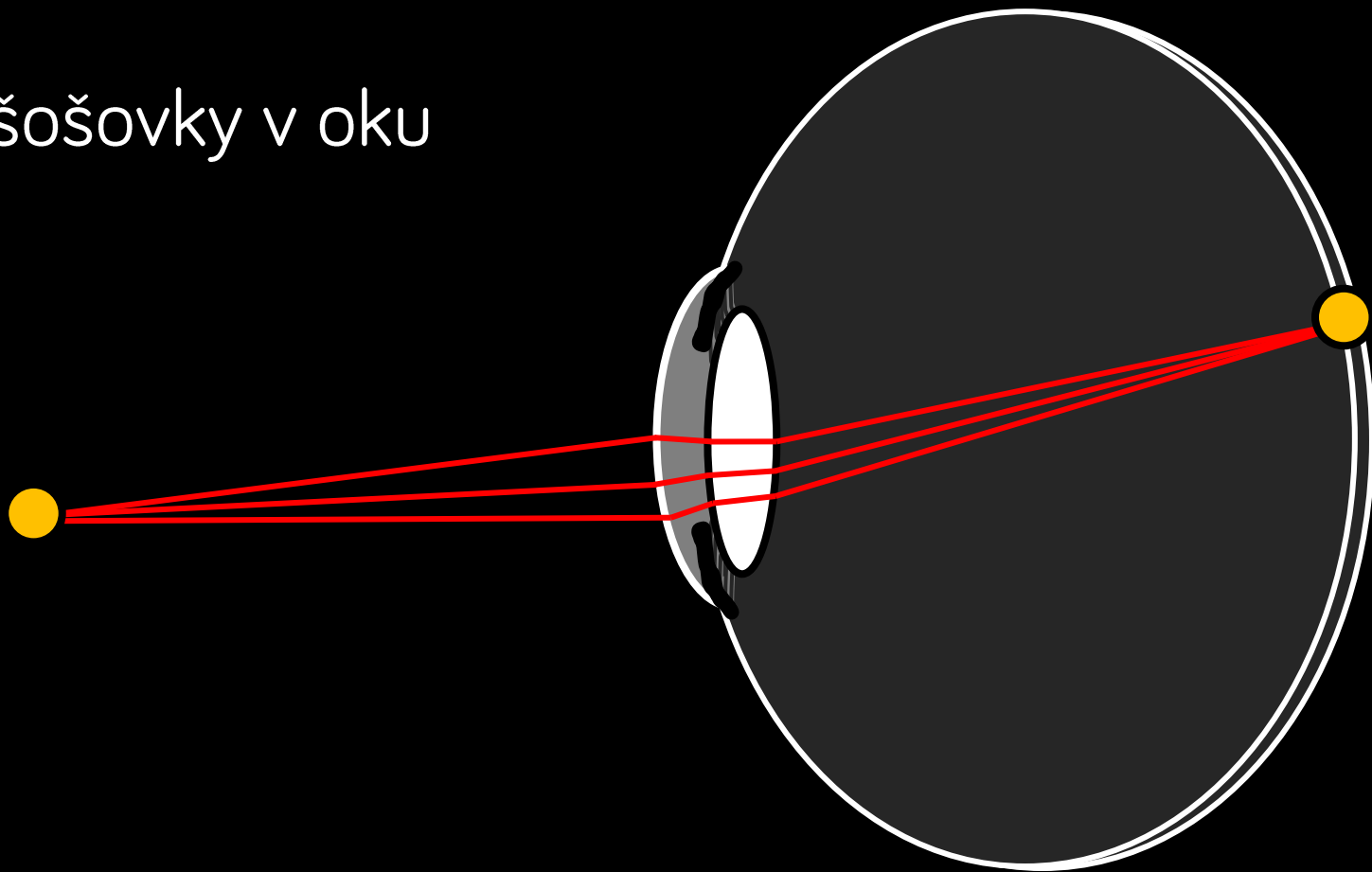


šošovky v teleskope





šošovky v oku



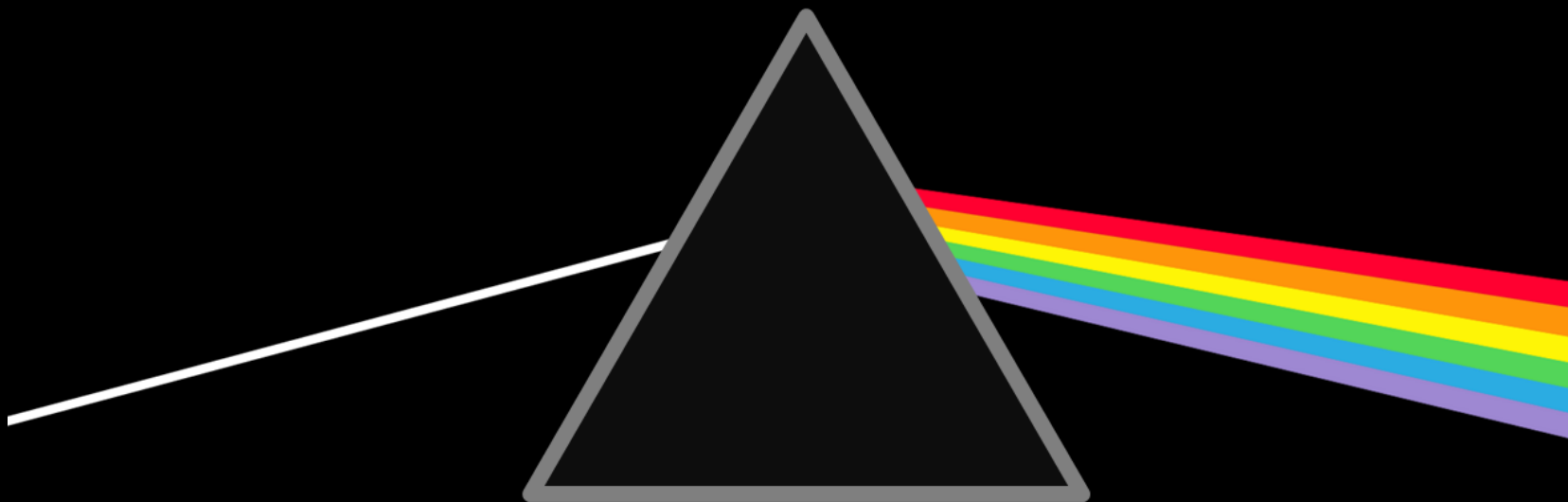


čisté a „špinavé“ světlo



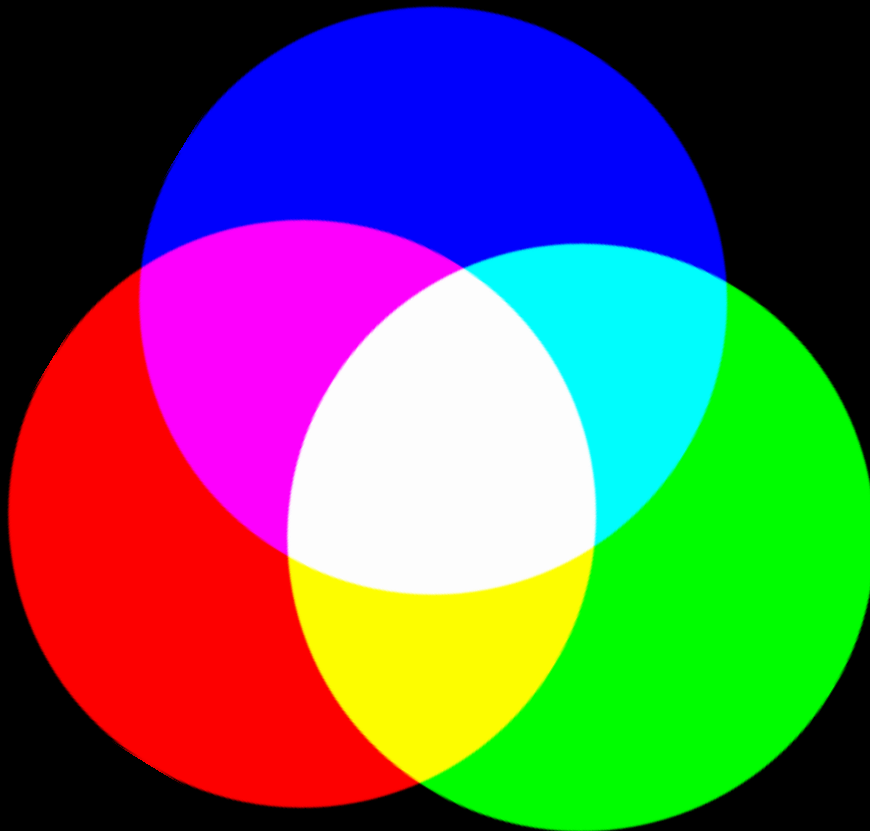
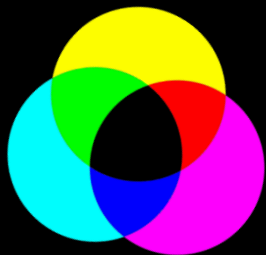


čisté a „špinavé“ světlo





skladanie



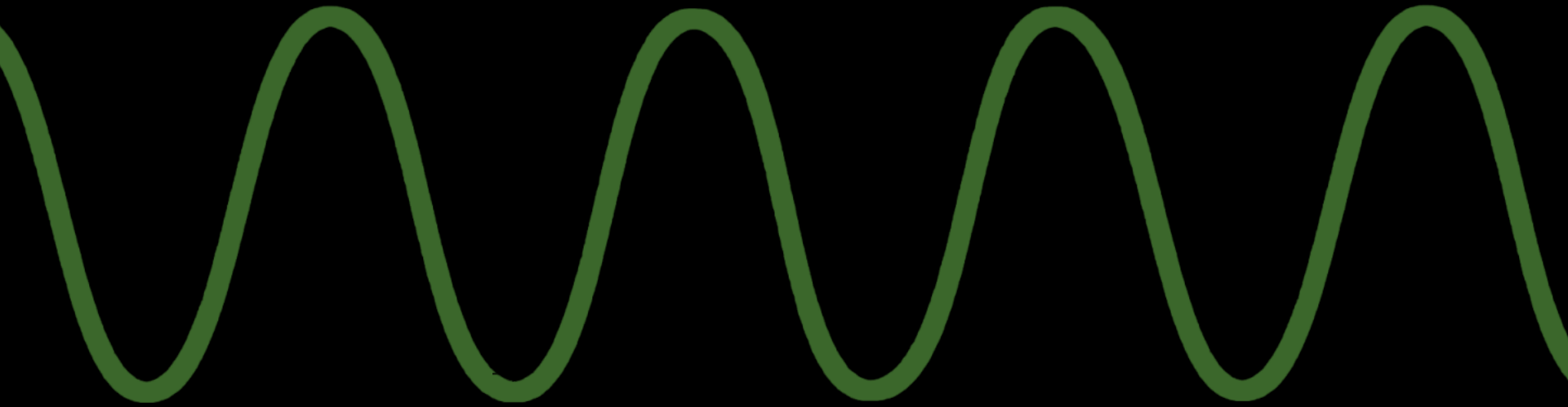
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absorbčné
čiary
sodíka



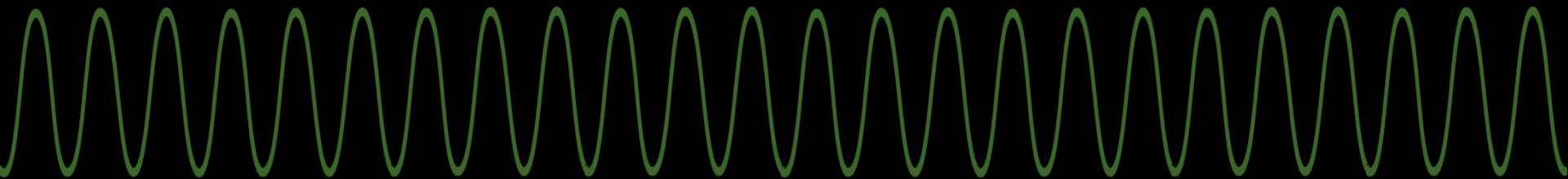
vlny





je svetlo vlna?

$1/2000$ mm



300 000 km/s



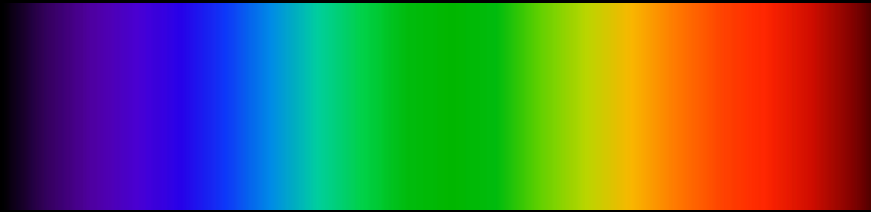
laser



vlas

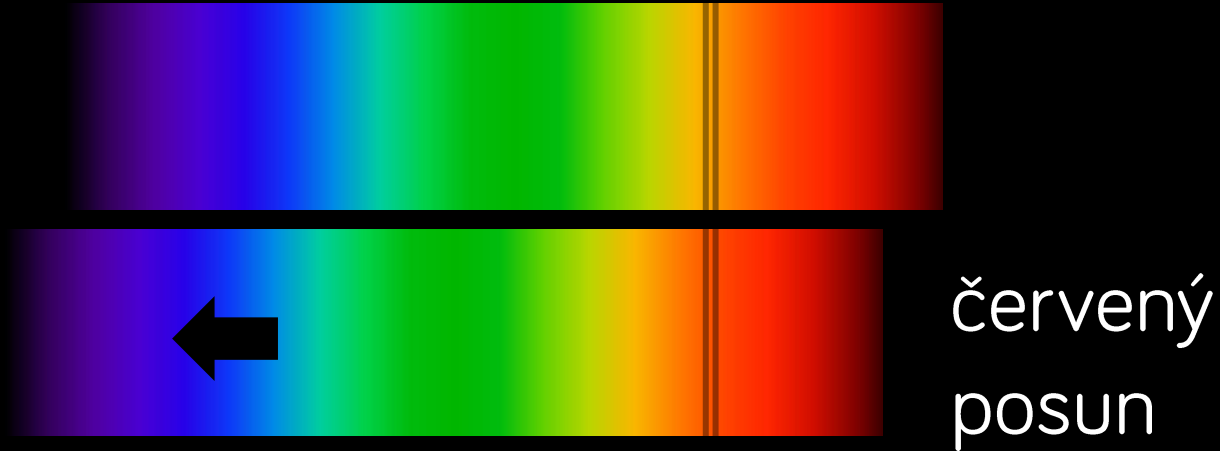




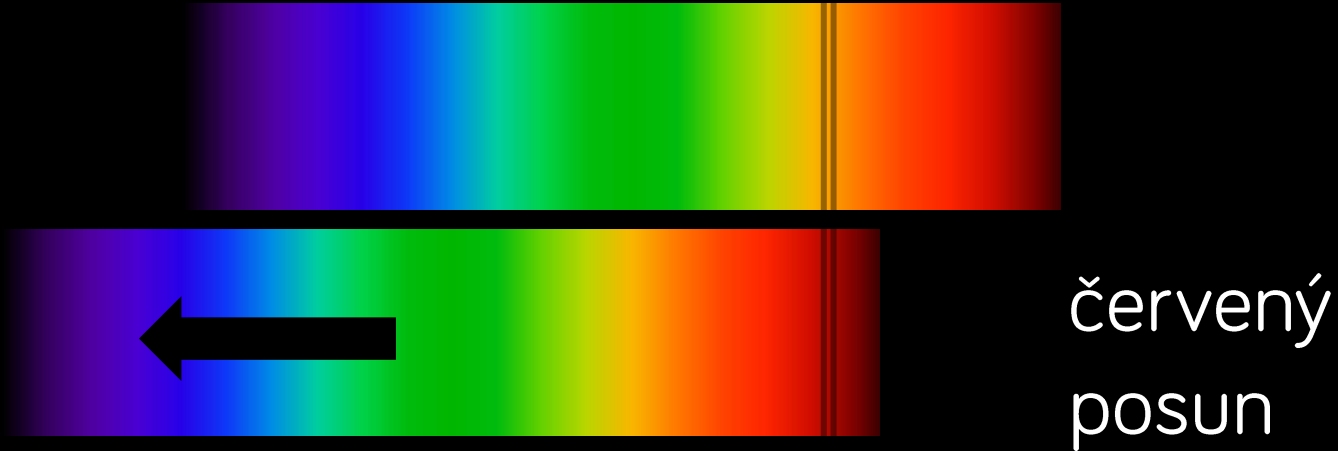


viditeľné spektrum

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slabšie a slabšie svetlo





slabšie a slabšie svetlo





slabšie a slabšie svetlo





slabšie a slabšie svetlo





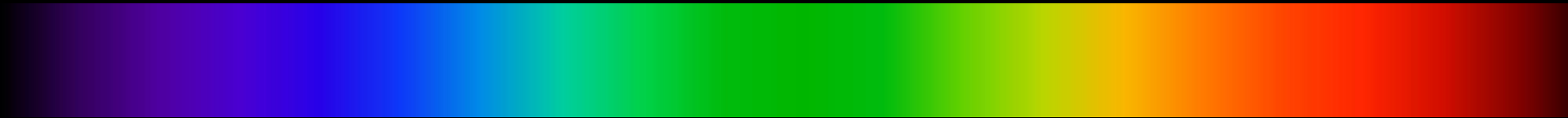
slabšie a slabšie svetlo

f o t ó n y



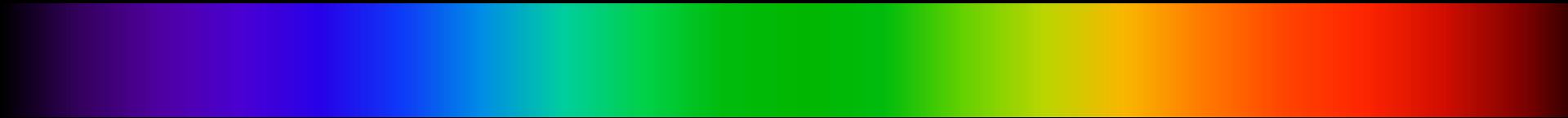
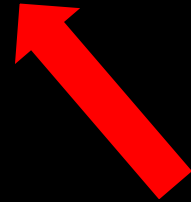
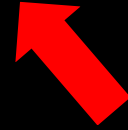


farba ... energia



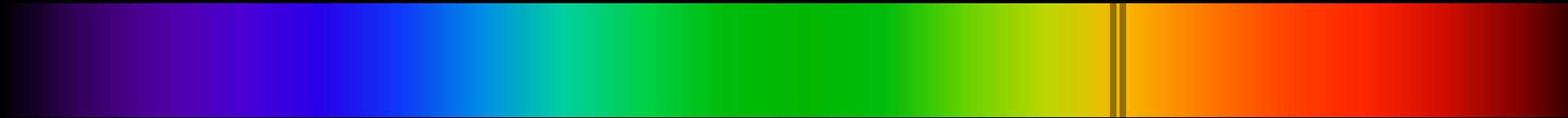


farba ... energia



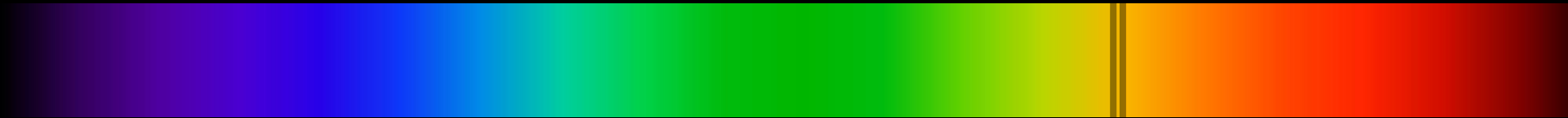


farba ... energia



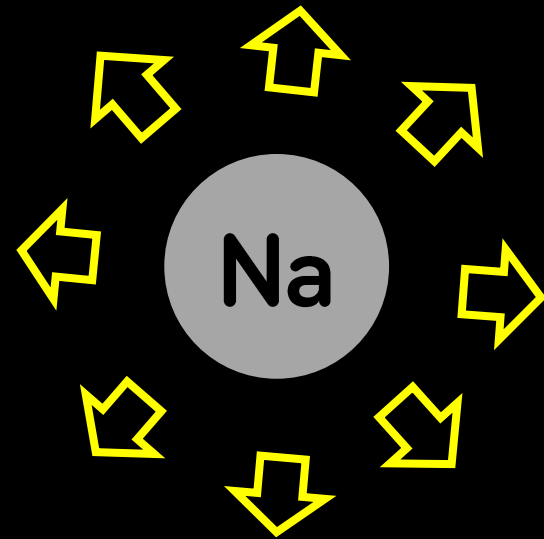


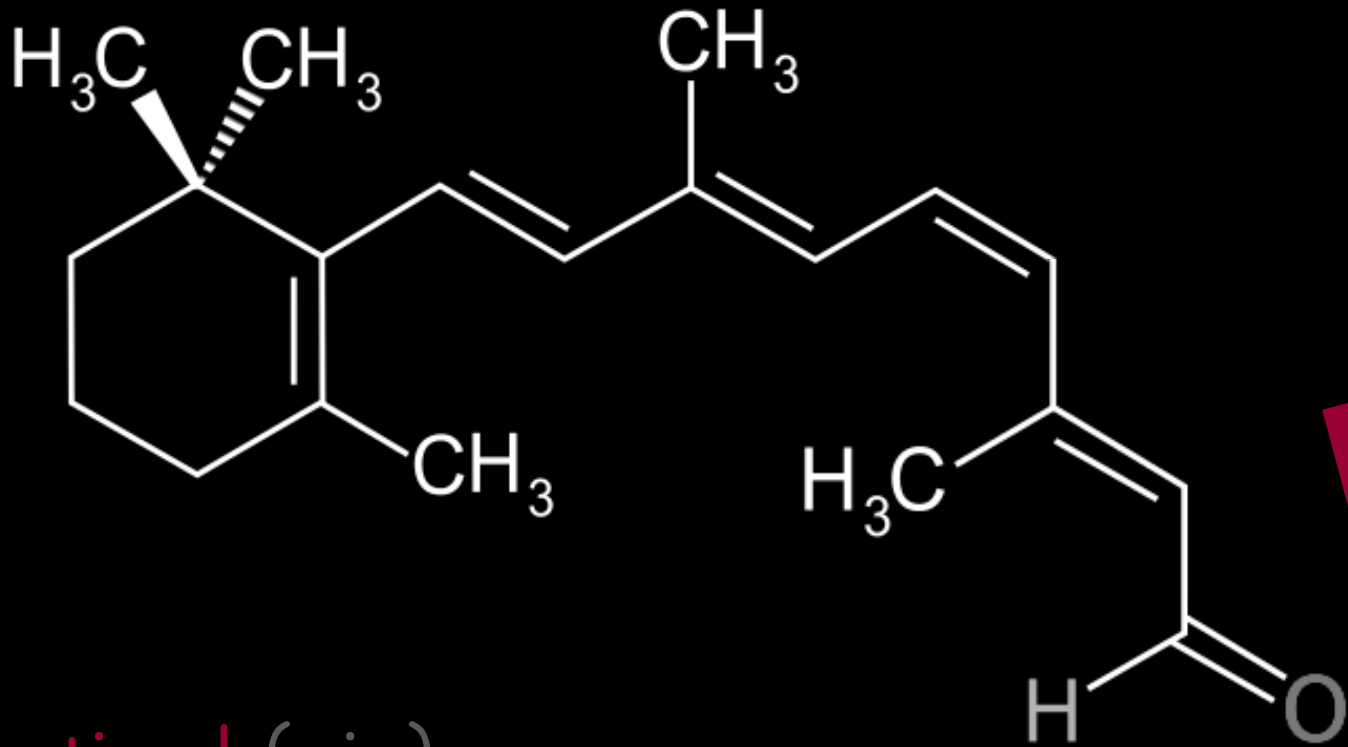
farba ... energia





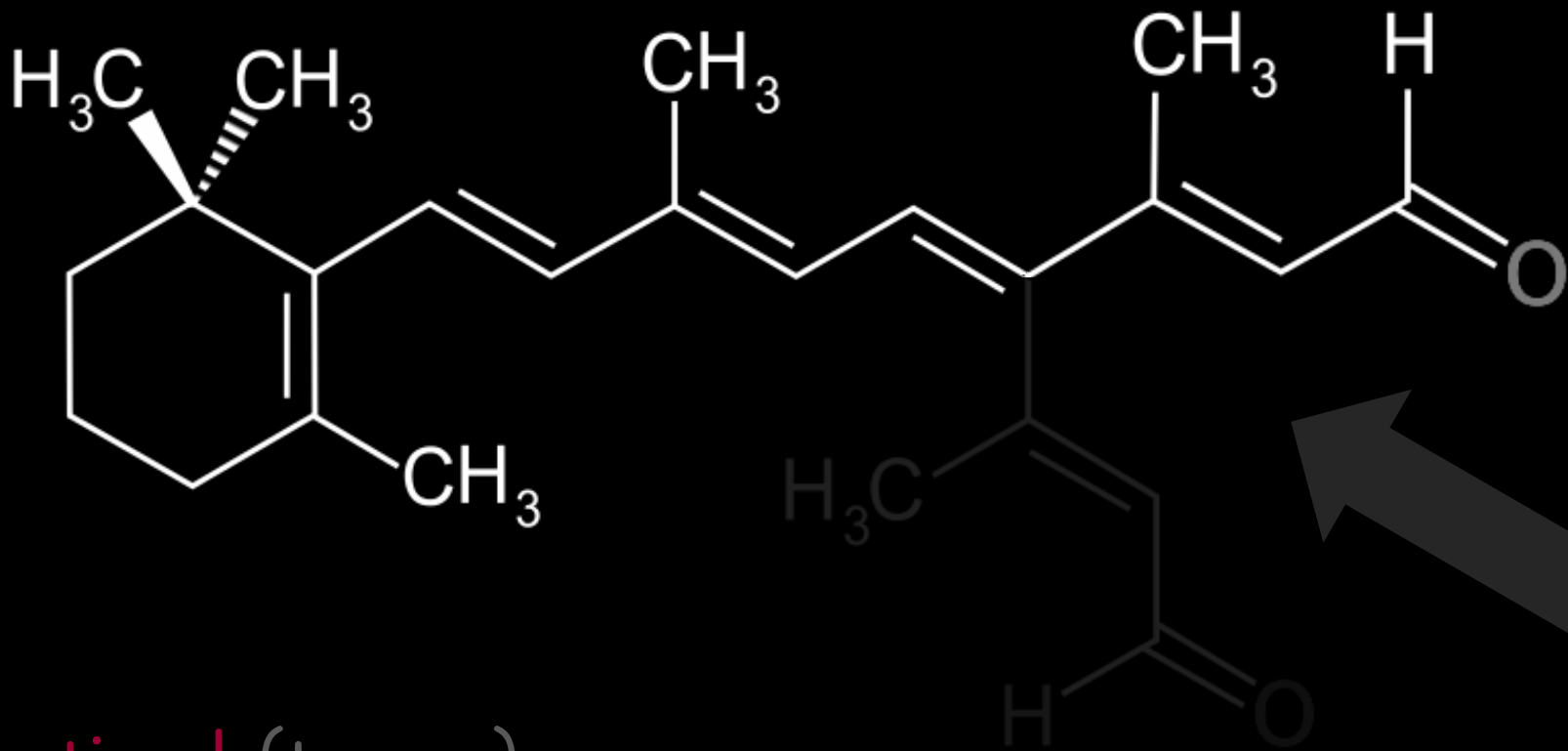
farba ... energia





retinal (cis)

[modified from RicHard-59/wikimedia]



retinal (trans)

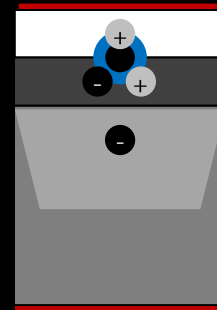
[modified from RicHard-59/wikimedia]



CCD: umelá sietnica

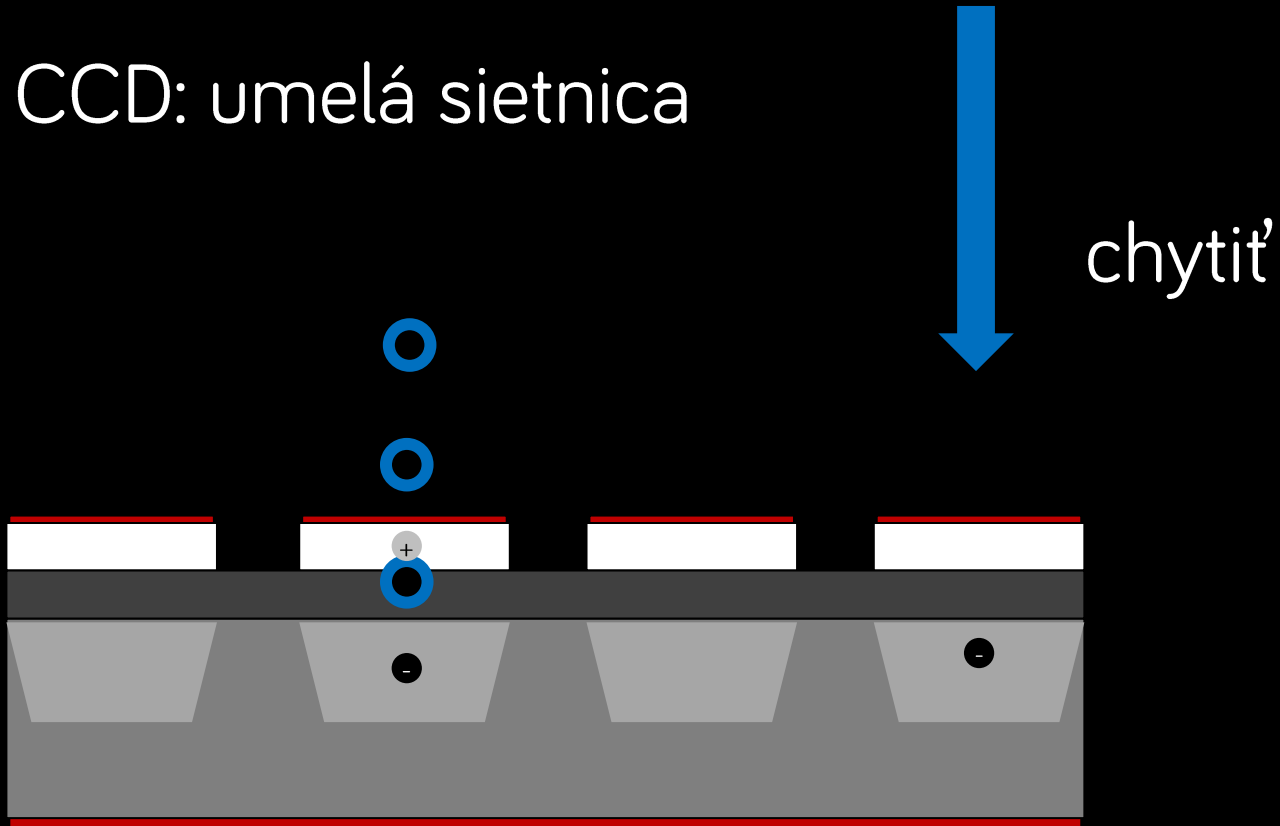


chytiť





CCD: umelá sieťnica

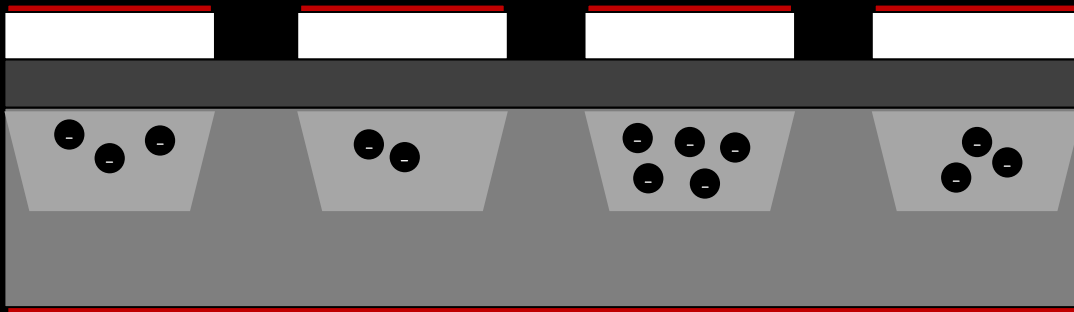




CCD: umelá sietnica



chytiť

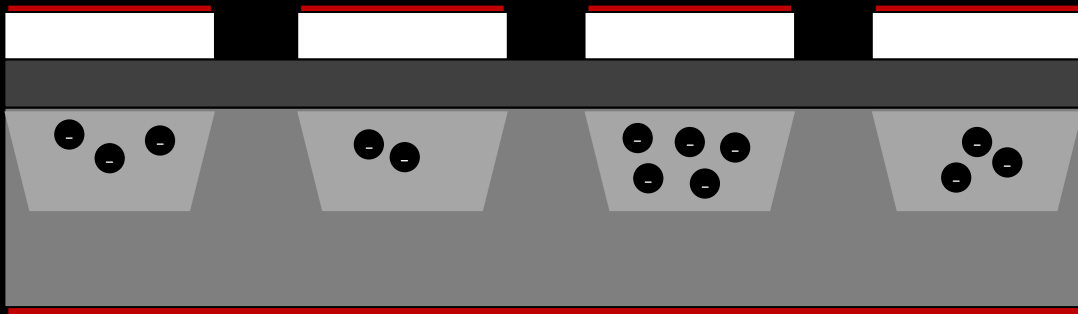




CCD: umelá sieťnica



chytiť



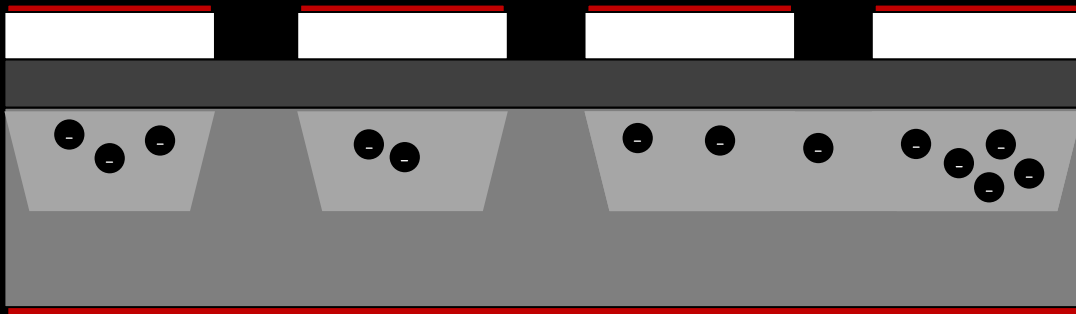
prečítať



CCD: umelá sieťnica



chytiť



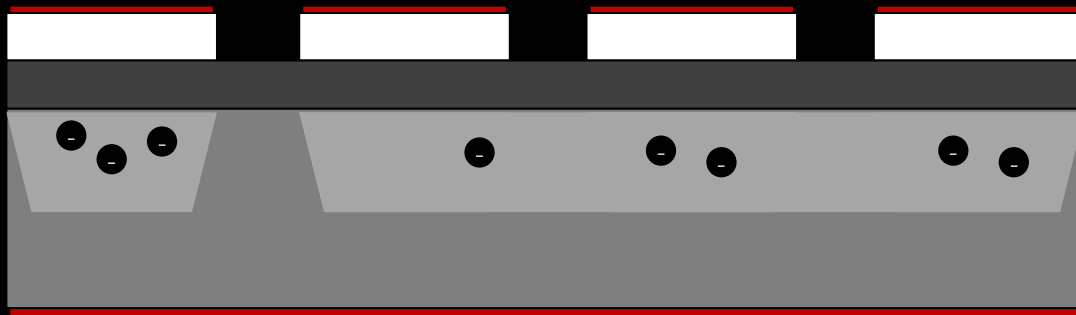
prečítať



CCD: umelá sieťnica



chytiť



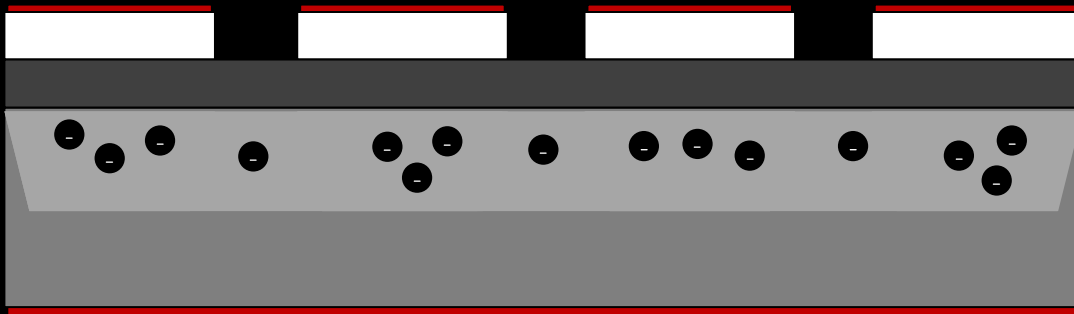
prečítať



CCD: umelá sieťnica



chytiť



prečítať

šošovka

objektív

sietnica

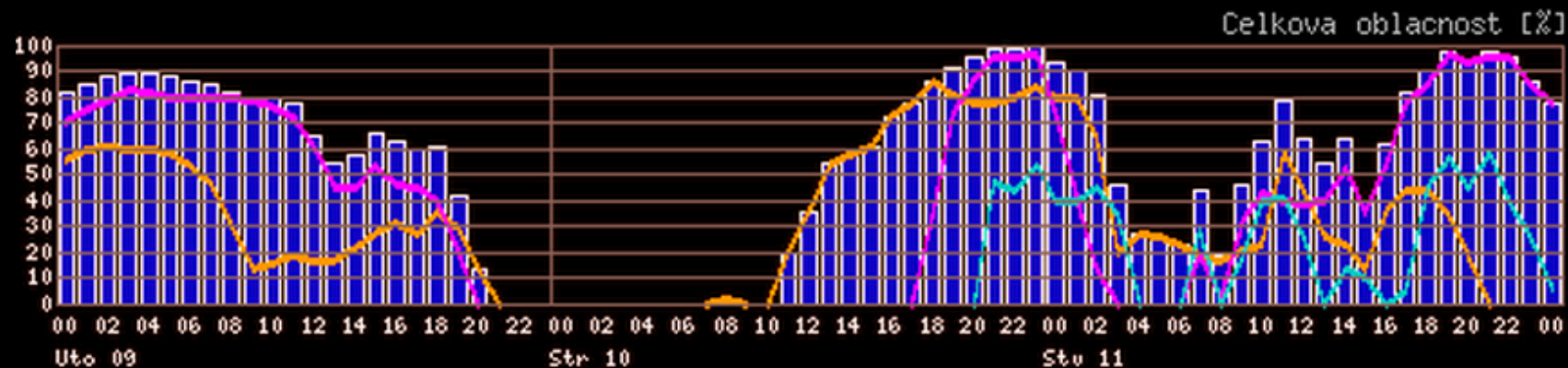
CCD

mozog

procesor

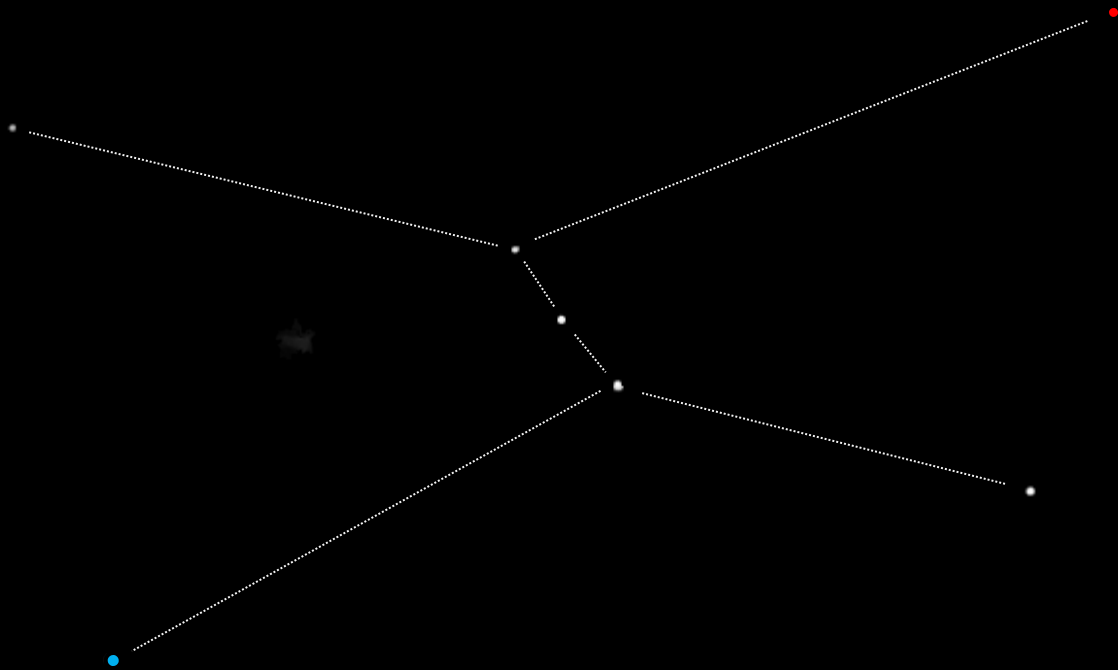


Bratislava (centrum)





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[Rogelio Bernal Andreo]