

Fundamentals of Imaging

Image composition

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Overview

- After hard math and physics, we can dedicate this lesson to a “softer”, albeit not less important, subject:
 - Is there a way to determine “good photography”?
 - Which rules do photographers use?
 - How do they choose their subject?
 - How do they compose an image?

Inst-a-matic

- Take you average person
- Let him/her buy a camera
- Or maybe let them use a cellphone
- What do they shoot?

Inst-a-matic

- This



Inst-a-matic

- Or maybe this?



Inst-a-matic

- A far cry from this:



Inst-a-matic

- Or this:



Ansel Adams, *Evening, McDonald Lake, Glacier National Park* (1942)

What does the layman do wrong?

- What goes wrong with the normal user?
- Photography is not as simple as it looks like
 - Plenty of rules
 - Lots of guidelines
 - Fine craftsmanship which needs
 - Eye for the subject
 - Knowledge of rules
 - Knowledge of light
 - Knowledge of colour
 - Knowledge of composition
 - Knowledge of camera, lenses, shutter speed, aperture values

Composition



Returning to the same ocean

Composition



Mt. Fuji

Composition



Yaw? Weee

Composition



Two ways at looking at a fish

Composition

- "Consulting the rules of composition before taking a photograph, is like consulting the laws of gravity before going for a walk."
- "Composition is the strongest way of seeing.." - Edward Weston (1930)



Composition

- “In a nutshell, composition is all about Simplification and EXclusion (SEX), then balancing what you've got.
- Repeat this until you get the strongest, simplest possible image”. Ken Rockwell(2009)



Composition

- Effective composition gives the eye a comfortable visual environment for exploration-free of pointless obstruction, dead ends and misleading directional cues.
- Think of an image content as its CARGO and composition as its means of DELIVERY.
Jim Krause (2005)



Why Composition?

- What is wrong with this?



Why Composition?

- What are you focusing on?



Why Composition?

- What are you focusing on?



Why Composition?

- What are you focusing on?



Why Composition?

- What are you focusing on?



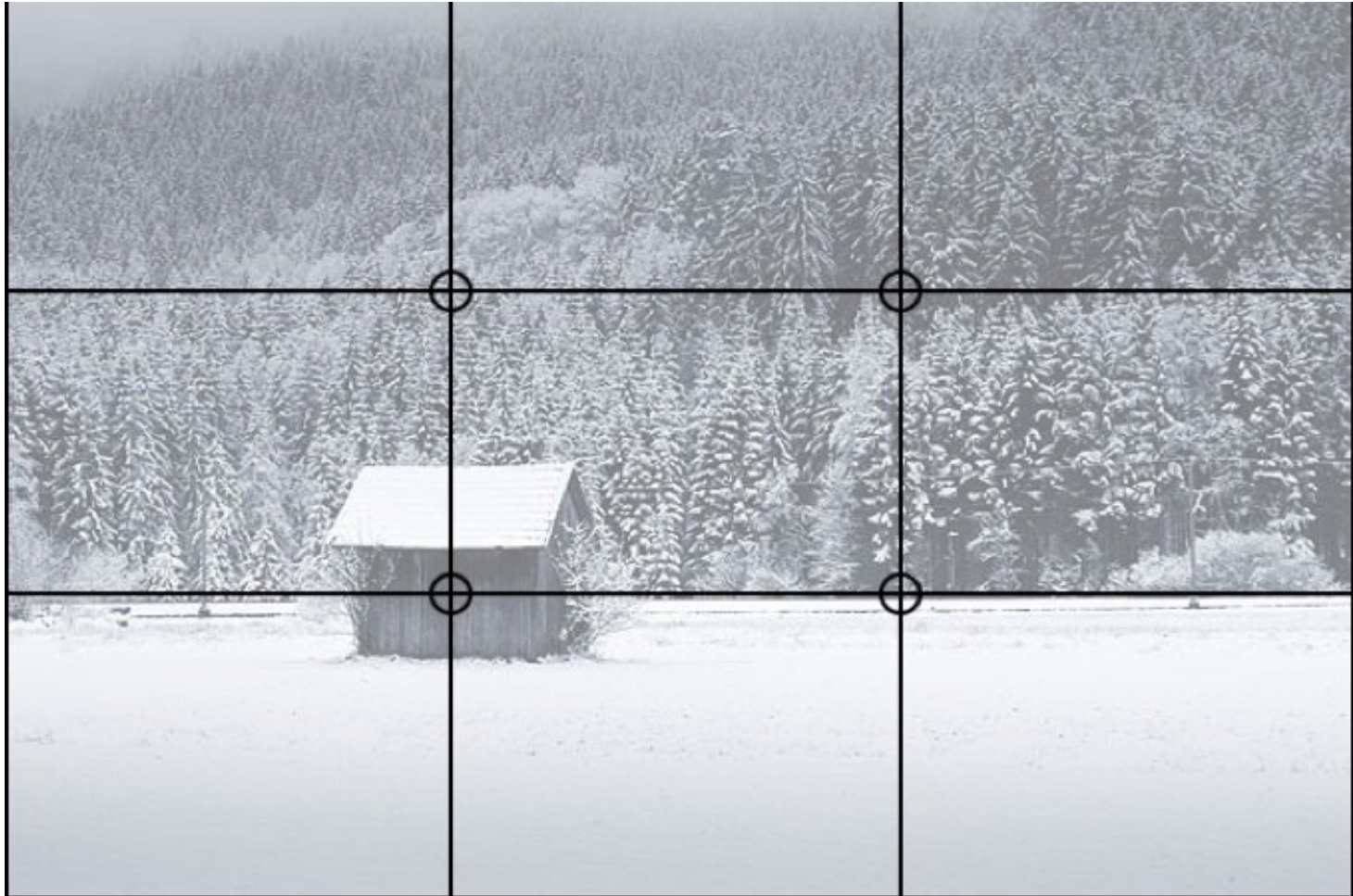
Why Composition?

- What are you focusing on?



How to compose?

- Rule of thirds



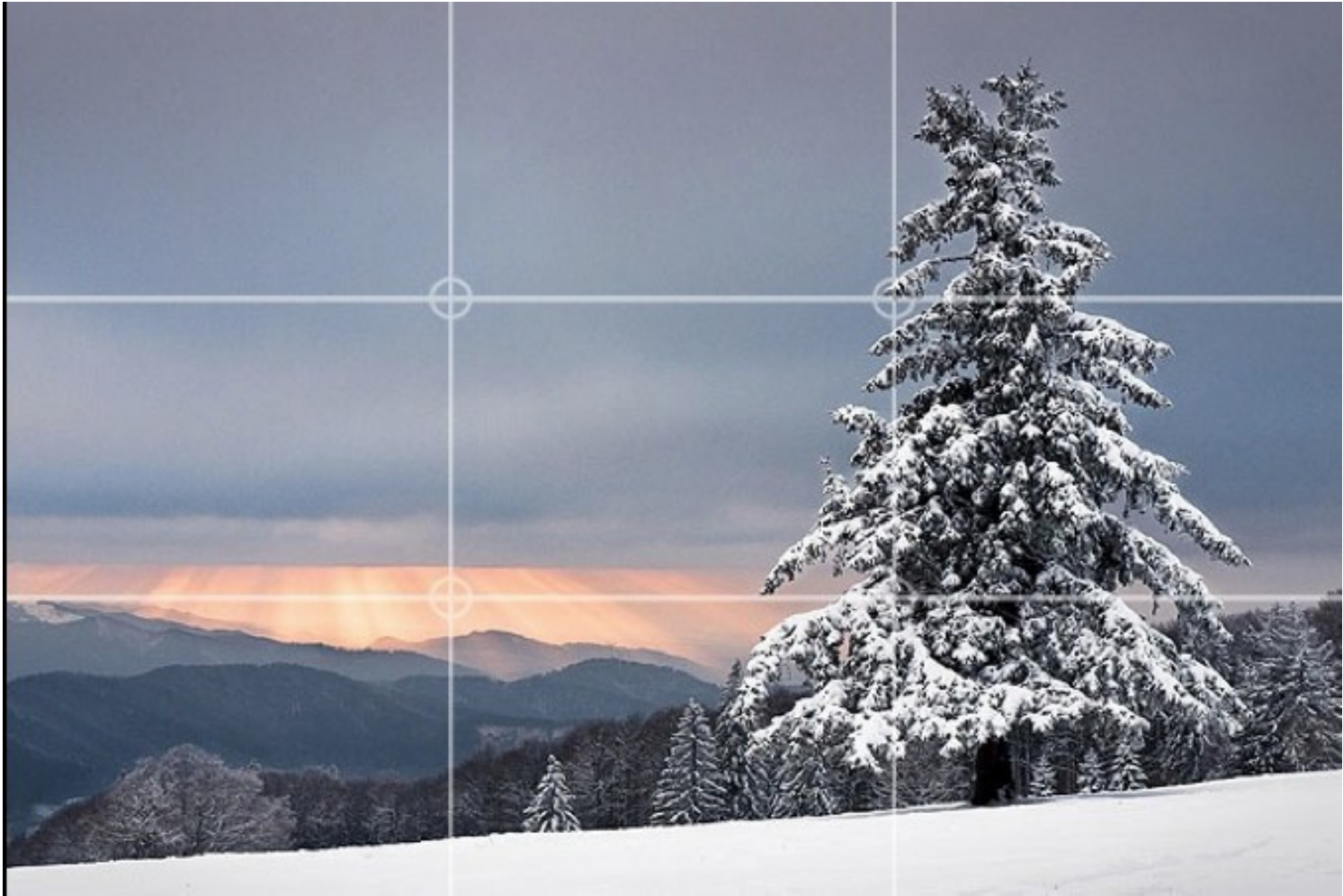
How to compose?

- Rule of thirds



How to compose?

- Rule of thirds



How to compose?

- Rule of thirds



How to compose?

- Rule of thirds



How to compose?

- Use the golden ratio

$$(a+b)/a = a/b = \varphi$$

where

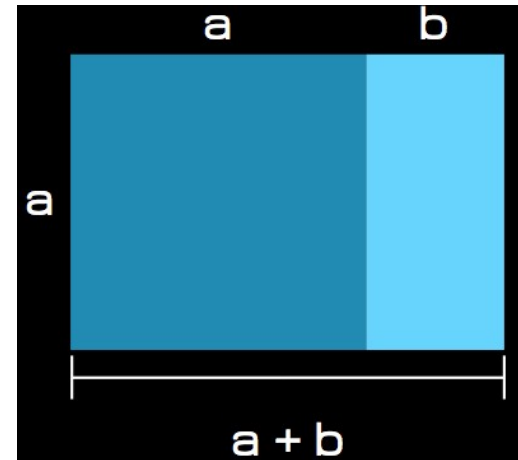
$$\varphi = (1 + \sqrt{5})/2 = 1.6180339887..$$

And $\phi = 0.6180339887...$

is the inverse of φ

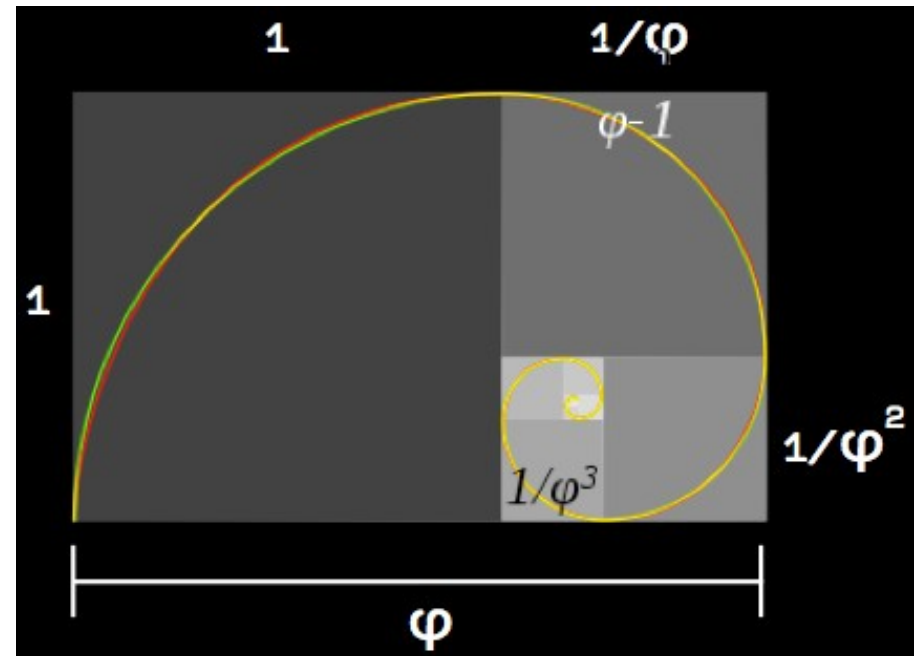
$$\varphi^{-1} = \phi$$

- Derived from the equation:
 $-1/\varphi = \varphi - 1$



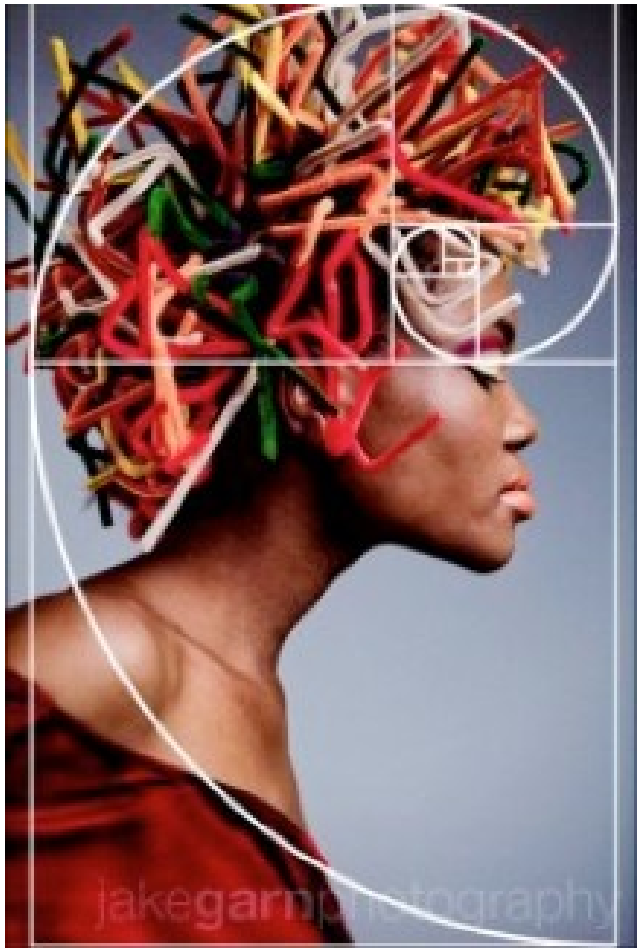
How to compose?

- Golden spiral:
- Approximate and true golden spirals.
 - The green spiral is made from quarter-circles tangent to the interior of each square,
 - red spiral is a Golden Spiral, a special type of logarithmic spiral.
 - Overlapping portions appear yellow.
 - The length of the side of one square divided by that of the next smaller square is the golden ratio.



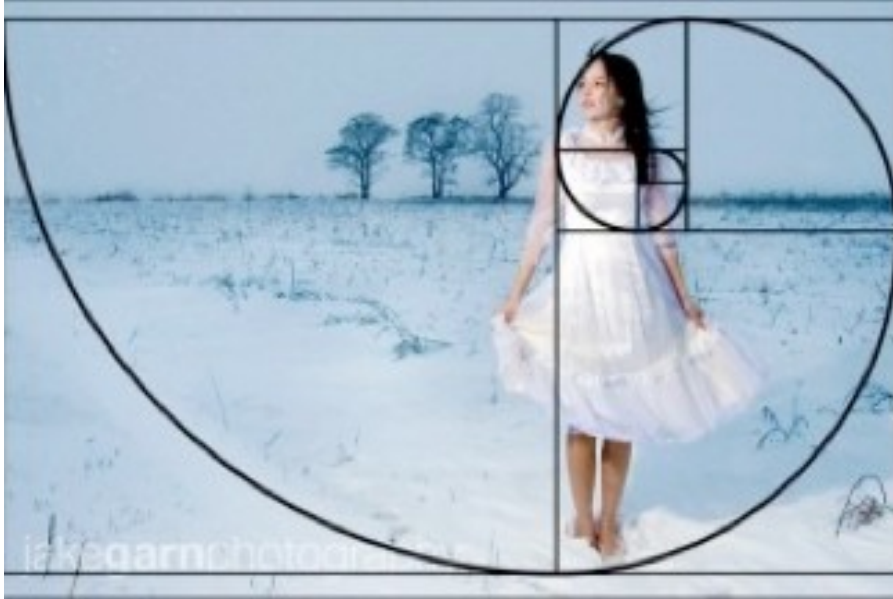
How to compose?

- Golden spiral:



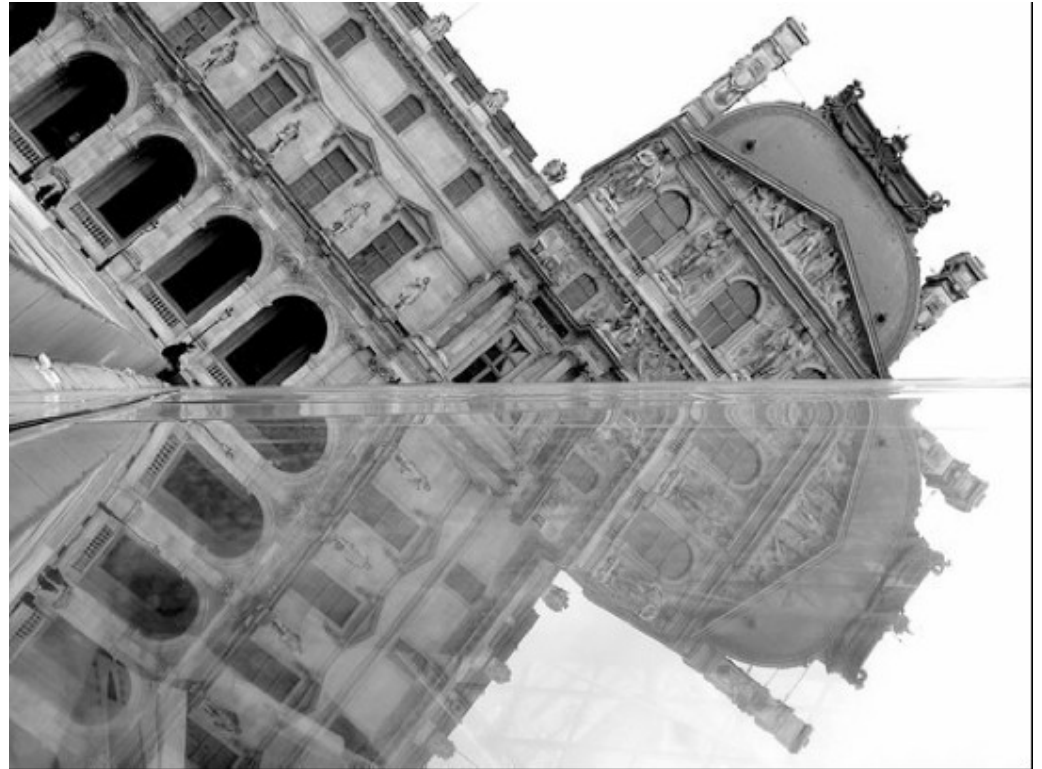
How to compose?

- Golden spiral:



How to compose?

- Use symmetry



How to compose?

- Use symmetry



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How to compose?

- Use asymmetry



How to compose?

- Use leading lines:



Copyright © 2014 John Mickevich

How to compose?

- Use the horizon for framing

Copyright © 2011 Ron cellospiller@flickr.com



How to compose?

- Unify,
don't separate:



How to compose?

- Frame things:



How to compose?

- Cropping:



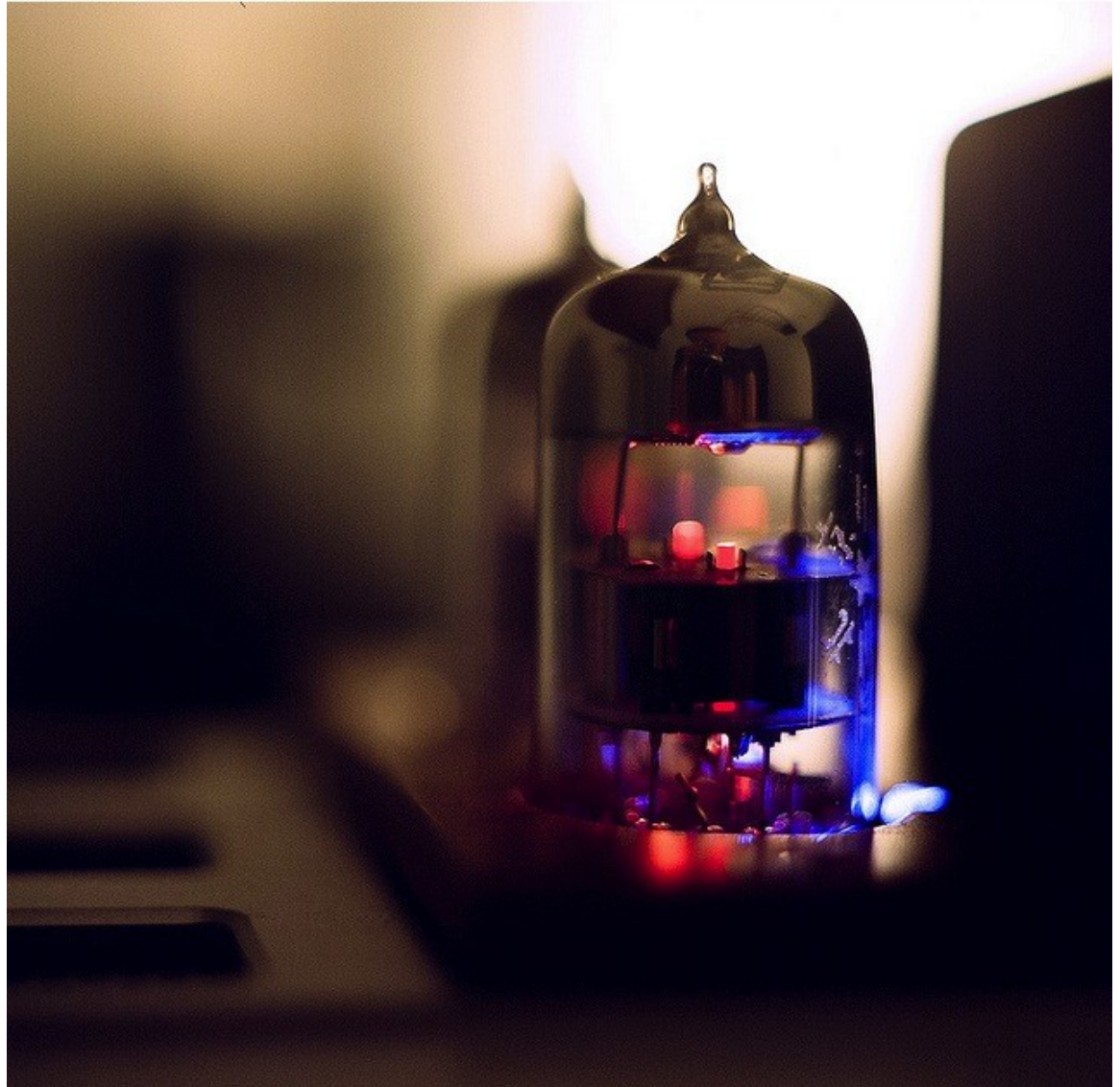
How to compose?

- Visual Hierarchy:



How to compose?

- Depth of field:



How to compose?

- Use lines and curves:



How to compose?

- Use repetition:



How to compose?

- Use visual textures:



How to compose?

- Use color simplicity:



How to compose?

- Thank you for your attention

Anyone thirsty?

