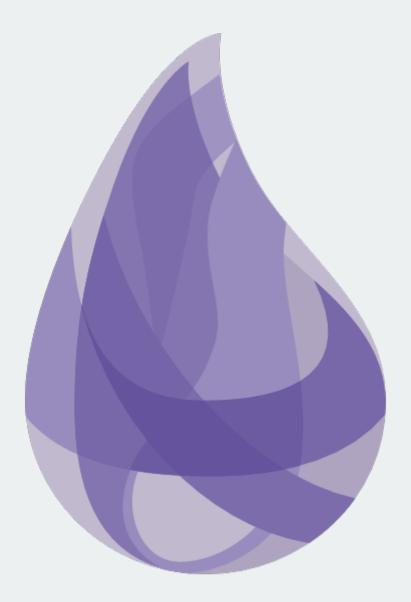
A Case For Elixir



Making a Case

- ✓ How are languages chosen today?✓ Why should Elixir get chosen?
- ✓ How do I get Elixir adopted?



Part 1

How are languages chosen today?





Business Contexts

- ✓ Risk
- ✓ Hiring
- ✓ Productivity
- ✓ Cost
- ✓ Adoption



Business Contexts: Risk

- ✓ Language instability
- ✓ Dependency instability
- ✓ Learning Curve
- ✓ Support
- ✓ Knowledge Silos



Business Contexts: Hiring

- ✓ Diverse candidate pool
- ✓ Language specific expertise
- ✓ Variety in skill sets and expertise



Business Contexts: Productivity

- ✓ Maintaining engineer "flow"
- ✓ Increased delivery of engineering value
- ✓ Quality and maintainability of software





Business Contexts: Cost

- ✓ Expenditures for servers
- ✓ Expenditures for training/learning
- ✓ Context switches



Business Contexts: Adoption

- ✓ Community size
- ✓ Searchability
- ✓ Dependencies
- ✓ Internal interest or competency in language







Why should Elixir get chosen?



Business Contexts: Elixir Risk

- ✓ Language stable
- ✓ Learning curve similar to Ruby
- ✓ Loads of support (forums, slack, dashbit, github, etc)
- Number of maintained, updated dependencies lacking

bit, github, etc) ndencies



Business Contexts: Elixir Risk

- ✓ Language stable
- ✓ Learning curve similar to Ruby
- ✓ Loads of support (forums, slack, dashbit, github, etc)
- Number of maintained, updated dependencies can be lacking, but you have Erlang!

bit, github, etc) ndencies can



Business Contexts: Elixir Hiring

- ✓ Increase in applications for job postings mentioning Elixir
- ✓ Large presence on slack (~25,000 users)
- ✓ Wide array of professionals and expertise available



- ✓ Language ergonomics best in class
- Community standards on formatting, documentation
- ✓ Compile times not too long



Pinterest Case Study¹

¹<u>Click here</u> for more details on the Pinterest case study.



Pinterest Case Study¹

✓ Notification system rewrite from Java to Elixir

¹<u>Click here</u> for more details on the Pinterest case study.



Pinterest Case Study¹

✓ Notification system rewrite from Java to Elixir ✓ Reduced infrastructure costs by 2x (30 servers to 15) servers)

¹ <u>Click here</u> for more details on the Pinterest case study.



Pinterest Case Study¹

- ✓ Notification system rewrite from Java to Elixir
- ✓ Reduced infrastructure costs by 2x (30 servers to 15 servers)
- ✓ Reduce amount of code by tenfold

¹ <u>Click here</u> for more details on the Pinterest case study.

to Elixir) servers to 15



Pinterest Case Study¹

- ✓ Notification system rewrite from Java to Elixir
- ✓ Reduced infrastructure costs by 2x (30 servers to 15 servers)
- ✓ Reduce amount of code by tenfold
- ✓ Huge success, want...moar...Elixir

¹ <u>Click here</u> for more details on the Pinterest case study.

to Elixir) servers to 15



Business Contexts: Elixir Cost

- ✓ Small learning curve, similar to Ruby
- ✓ Staying in context with fast test suite, CL tools, native documentation and more



Business Context: Elixir Cost

Bleacher Report Case Study²

² <u>Click here</u> for more details on the Bleacher Report case study.



Business Context: Elixir Cost

Bleacher Report Case Study²

✓ Reduced infrastructure needs (150 servers -> 5 servers)

² Click here for more details on the Bleacher Report case study.



Business Context: Elixir Cost

Bleacher Report Case Study²

- ✓ Reduced infrastructure needs (150 servers -> 5) servers)
- ✓ Ease of training due to Ruby familiarity³

² Click here for more details on the Bleacher Report case study.

³ Click here for more details on Ben Marx's views on Ruby to Elixir learning curve.





- ✓ Large community on slack (~ 25,000 users)
- ✓ Consultancies specialize in Elixir (Dockyard, Dashbit)
- ✓ Google searches yield helpful results
- ✓ Fantastic tools for IoT (nerves) and web (phoenix)



Mixpanel Case Study⁴

⁴ Click here for more details on Mixpanel's change from Erlang to Python.



Mixpanel Case Study⁴

✓ One service in Mixpanel using Erlang (deemed business critical).

⁴ <u>Click here</u> for more details on Mixpanel's change from Erlang to Python.



Mixpanel Case Study⁴

- ✓ One service in Mixpanel using Erlang (deemed) business critical).
- ✓ Rewritten because no internal Erlang expert.

⁴ Click here for more details on Mixpanel's change from Erlang to Python.



Mixpanel Case Study⁴

- ✓ One service in Mixpanel using Erlang (deemed) business critical).
- ✓ Rewritten because no internal Erlang expert. ✓ Moved to Python due to internal competencies.

⁴ Click here for more details on Mixpanel's change from Erlang to Python.





How do I get Elixir adopted?





Start Small



Expect Resistance





Leverage the Community



Experimentation Time Box



Strength in Numbers



Leverage Opportunity



defp allocate_engineers(%{conference: false}), do: :elixir defp allocate_engineers(%{conference: true}), do: :conference



Leverage Proven Processes



Define Success



Thank you

You can find me online!





Sterling Woods

full_stackory

in <u>phereford</u>

