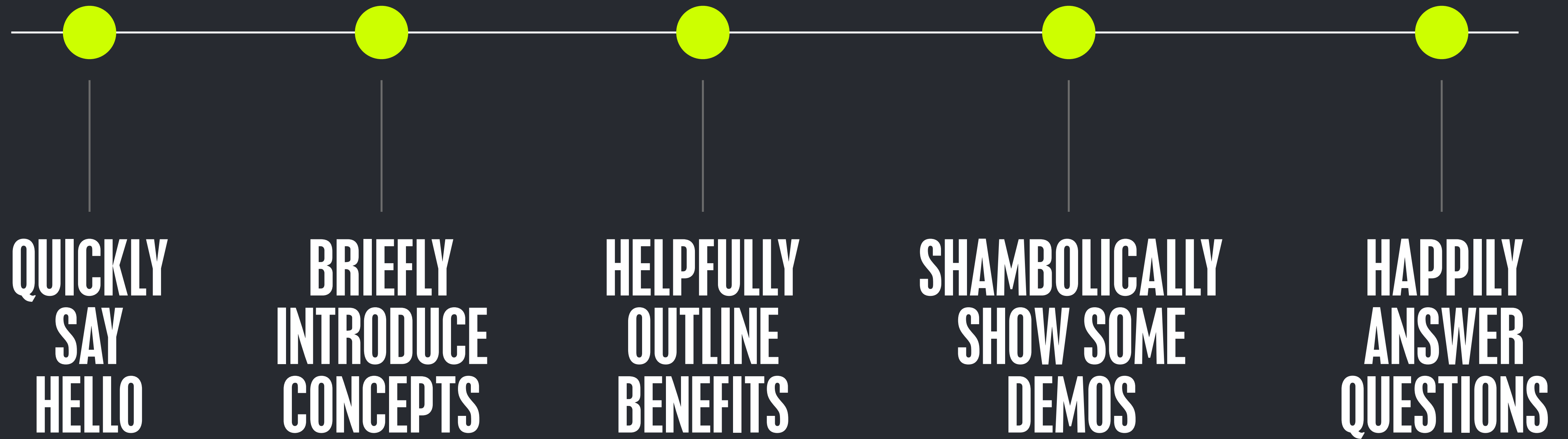




GETTING STUCK IN TO JAMSTACK

PHIL HAWKSWORTH



@ PHIL HAWKSWORTH
DEVELOPER EXPERIENCE,
NETLIFY

STACKS FOR DAYZ

AN / LAMP / MAMP / XAMP / ROR / WISA / MEAN

WISA / MEAN / LAMP / MAMP / XAMP / ROR /

**ISN'T JAMSTACK JUST ANOTHER
WORD FOR STATIC SITES?**

SOME PEOPLE, WHO HAVE BEEN AROUND A WHILE

jamstack

JAVASCRIPT / API / MARKUP

jamstack

A modern architecture —

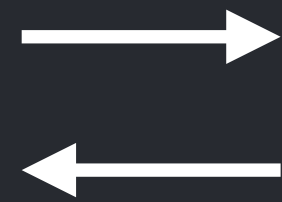
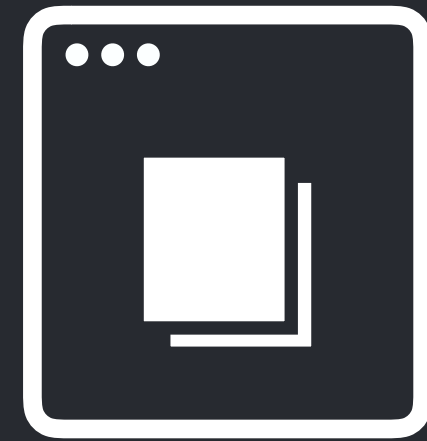
*Create fast and secure sites and dynamic apps
with **J**avaScript, **A**PIs, and pre-rendered
Markup, served without web servers*

TRADITIONAL

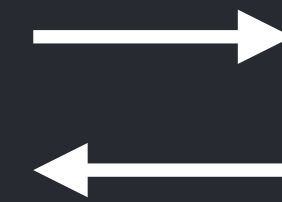
vs

JAMSTACK

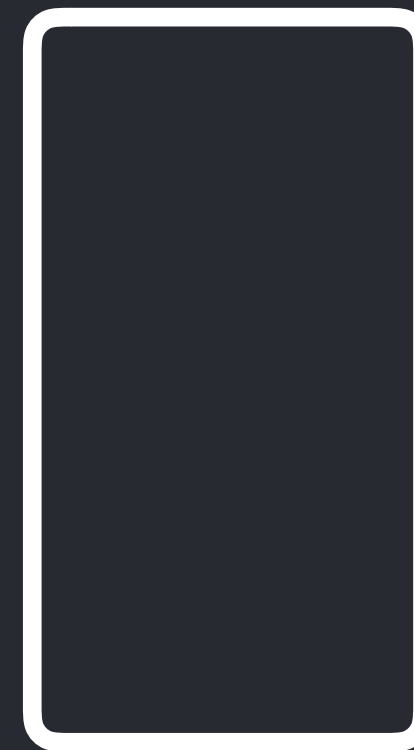
traditional



CDN



LOAD BALANCER



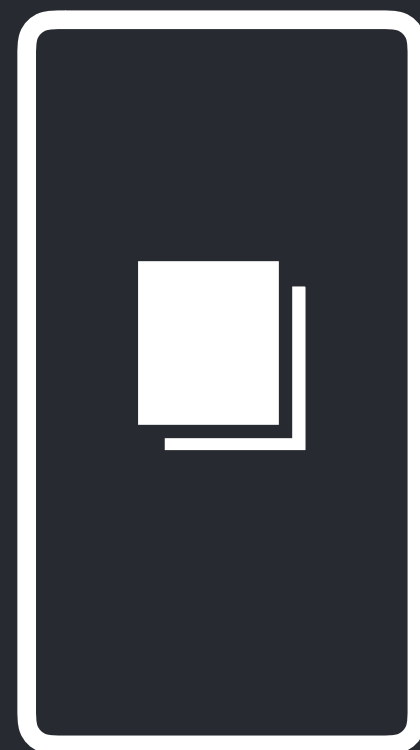
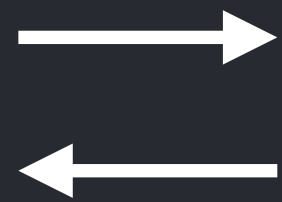
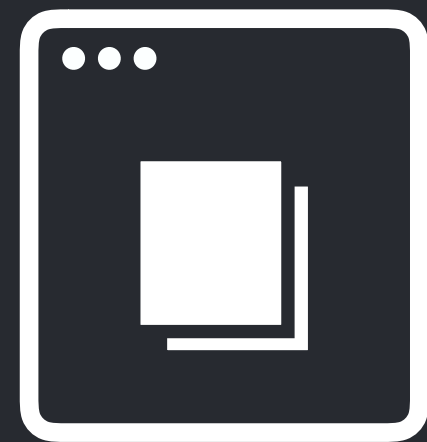
WEB SERVERS



DB SERVERS

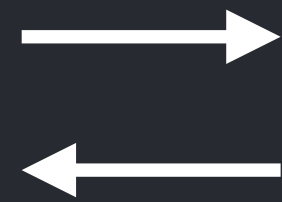
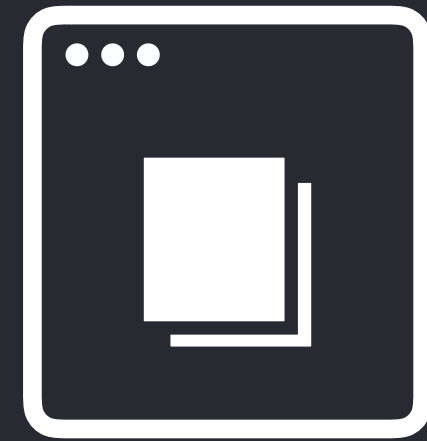


jamstack

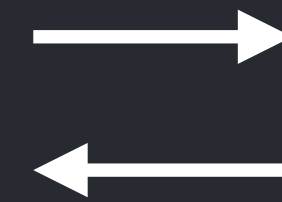
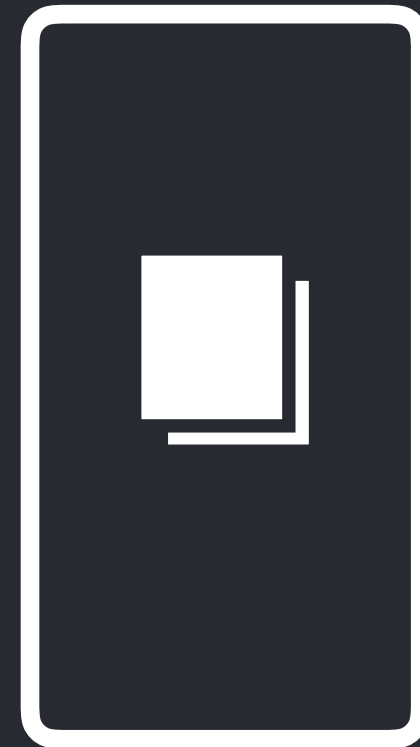


SIMPLIFYING *the* STACK

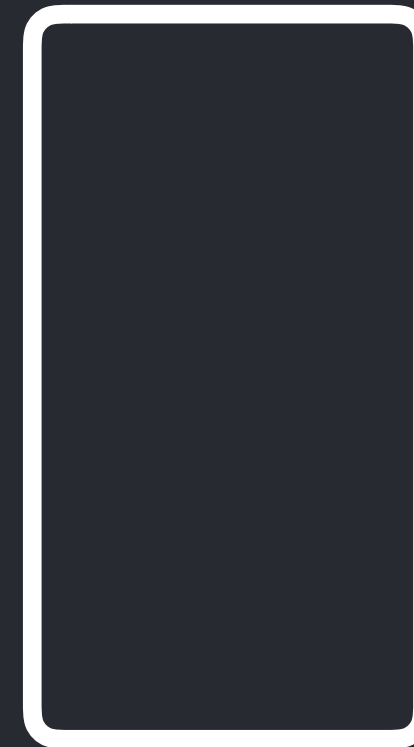
traditional



CDN



LOAD BALANCER



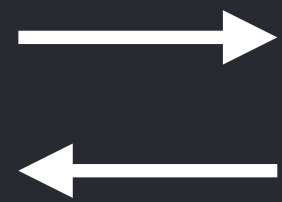
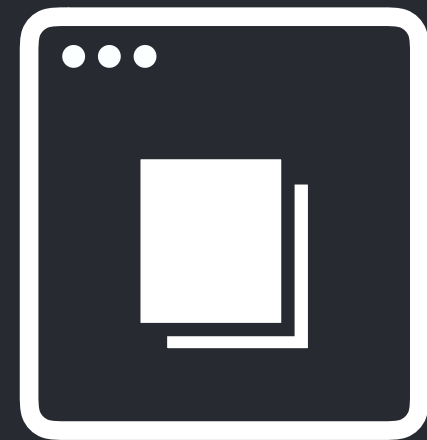
WEB SERVERS



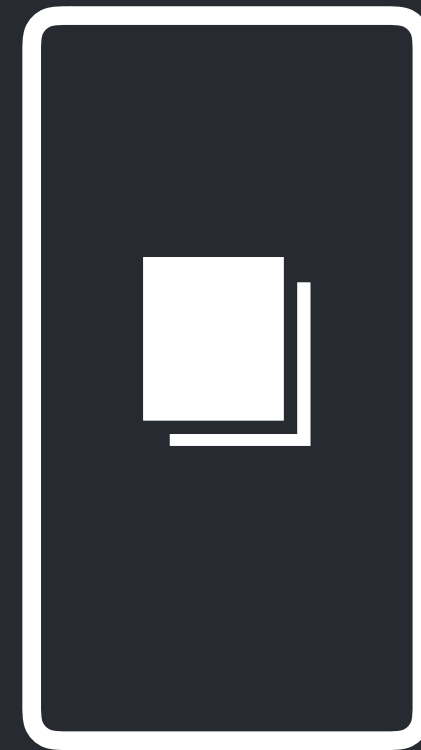
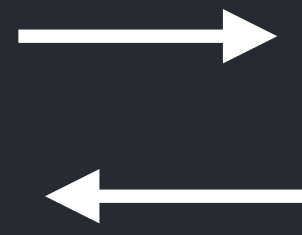
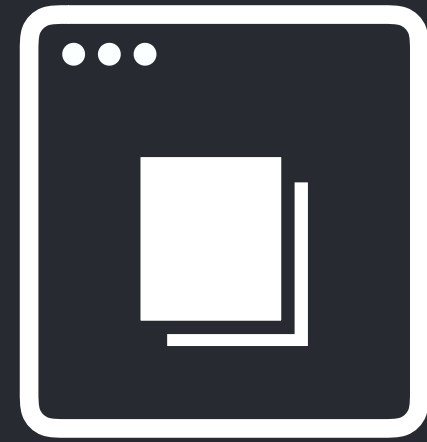
DB SERVERS



jamstack



jamstack



REQUEST TIME

BUILD TIME

DEPLOYMENT



GET TO THE ~~CHOPPER~~ CDN



jamstack

JAVASCRIPT *&* API *&* MARKUP

YOU DON'T HAVE TO USE ALL THREE

is it jamstack?

JEKYLL
YAML
NO JS
NO APIs
GITHUB PAGES

yes

GATSBY
MARKDOWN
GRAPHQL APIs
JS HYDRATION
AMAZON S3

yes

HUGO
MARKDOWN
JS INTERACTIONS
NO APIs
GOOGLE CLOUD

yes

NUXT
JSON
JS INTERACTIONS
COMMERCE APIs
NETLIFY

yes

HAND-MADE PWA
WEBPACK
JWT
BROWSER APIs
AZURE

yes

ORIGIN SERVER

JAMSTACK

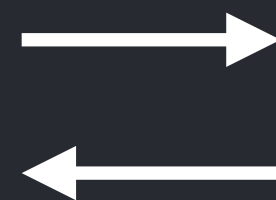
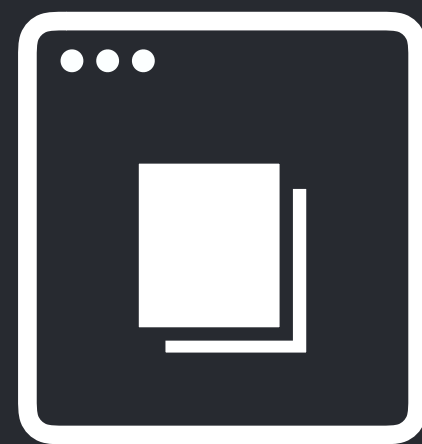
means

**CAPABLE OF BEING SERVED
DIRECTLY FROM A CDN**

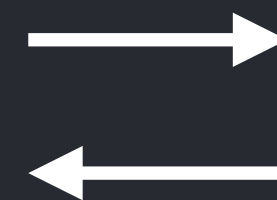
ENJOYS THE BENEFITS
of
SERVING STATIC ASSETS

**A GREATLY REDUCED
SURFACE AREA**

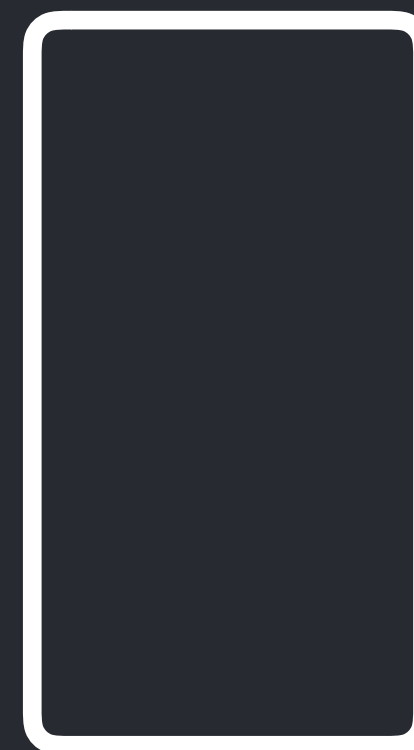
traditional



CDN



LOAD BALANCER



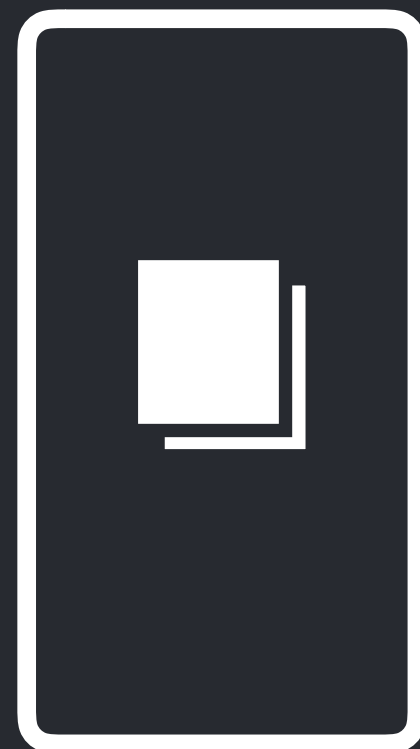
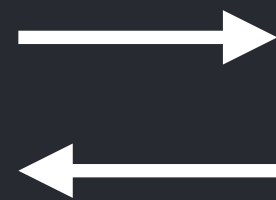
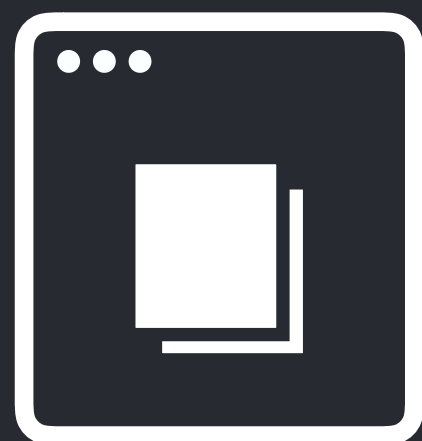
WEB SERVERS



DB SERVERS



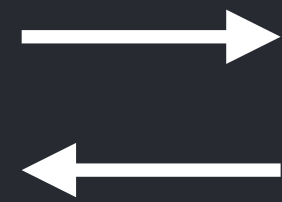
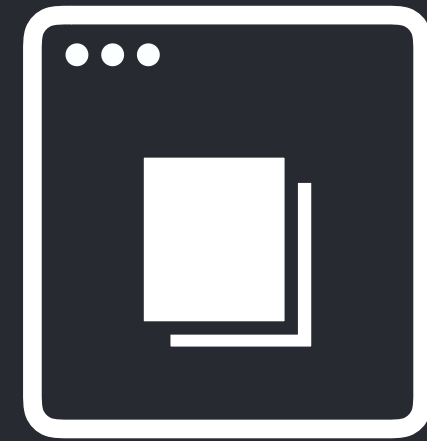
jamstack



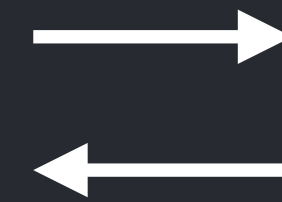
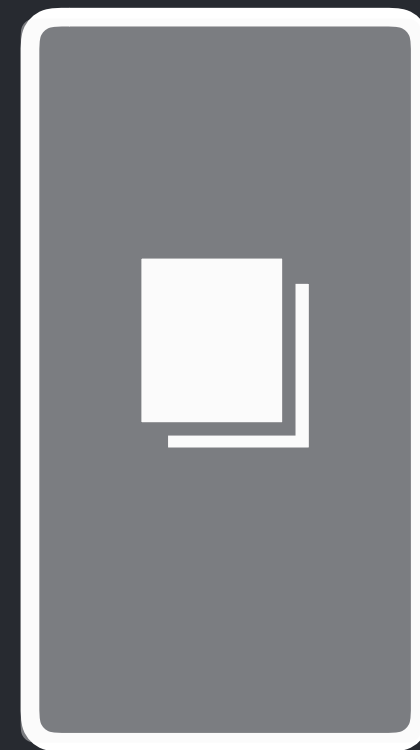
**TRADITIONAL STACKS
ADD STATIC LAYERS
IN ORDER TO IMPROVE
PERFORMANCE**

CACHING GALORE

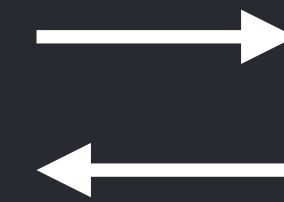
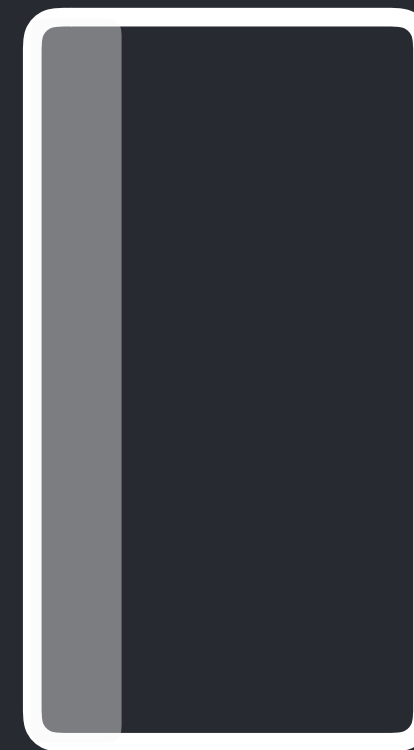
traditional



CDN



LOAD BALANCER



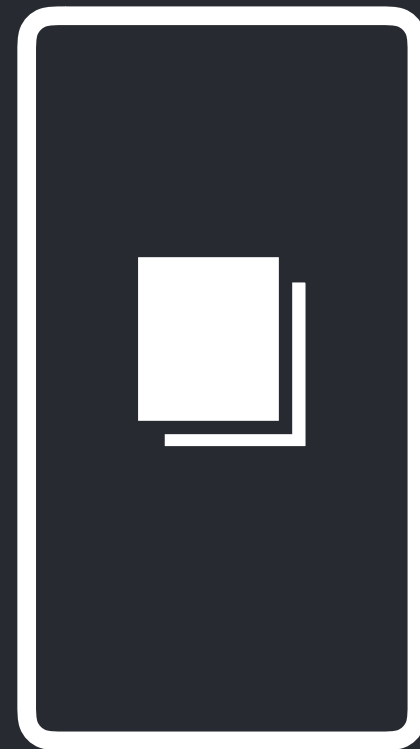
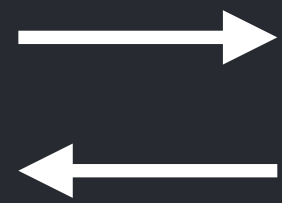
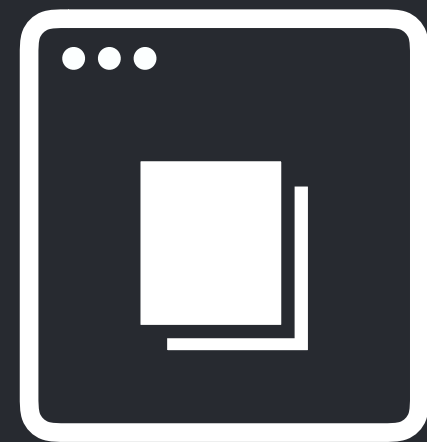
WEB SERVERS



DB SERVERS

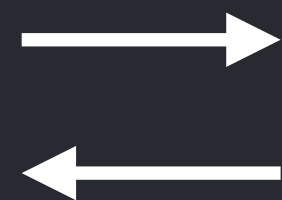
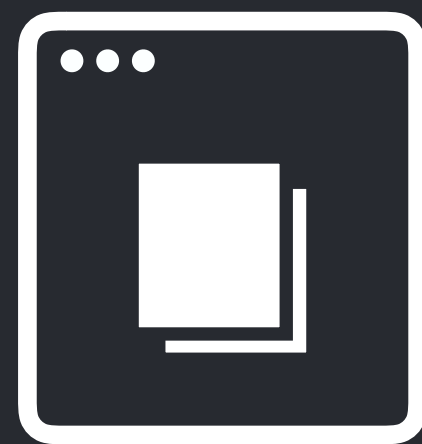


jamstack

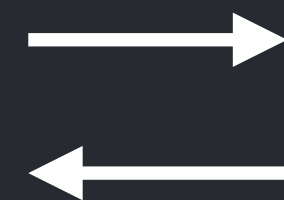
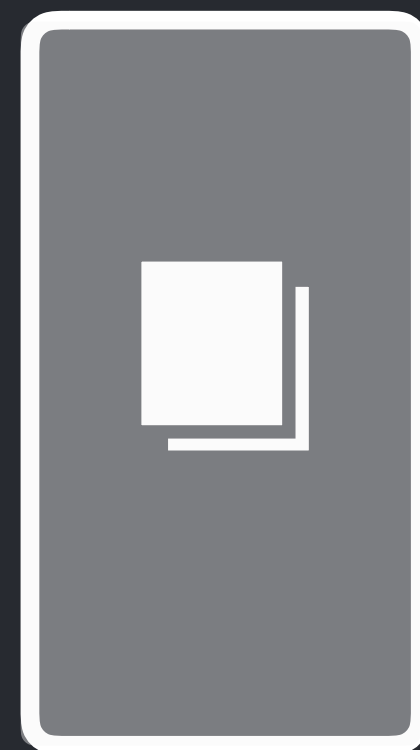


**TRADITIONAL STACKS
ADD INFRASTRUCTURE
IN ORDER TO SCALE**

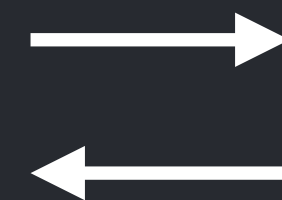
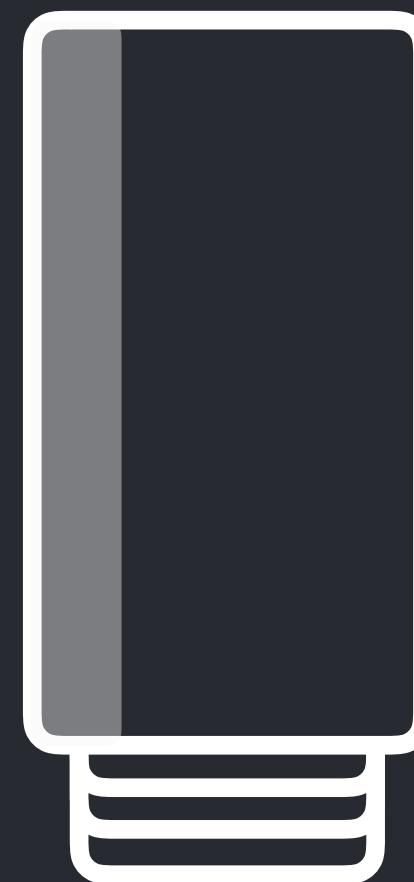
traditional



CDN



LOAD BALANCER



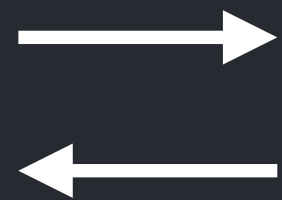
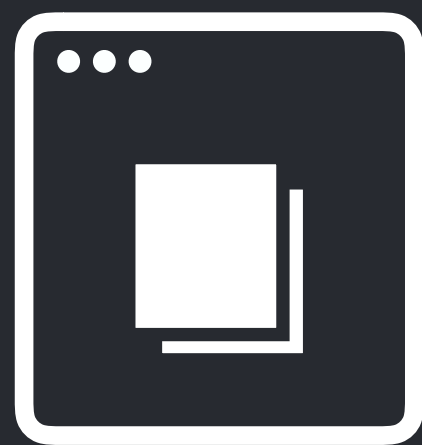
WEB SERVERS



DB SERVERS



jamstack

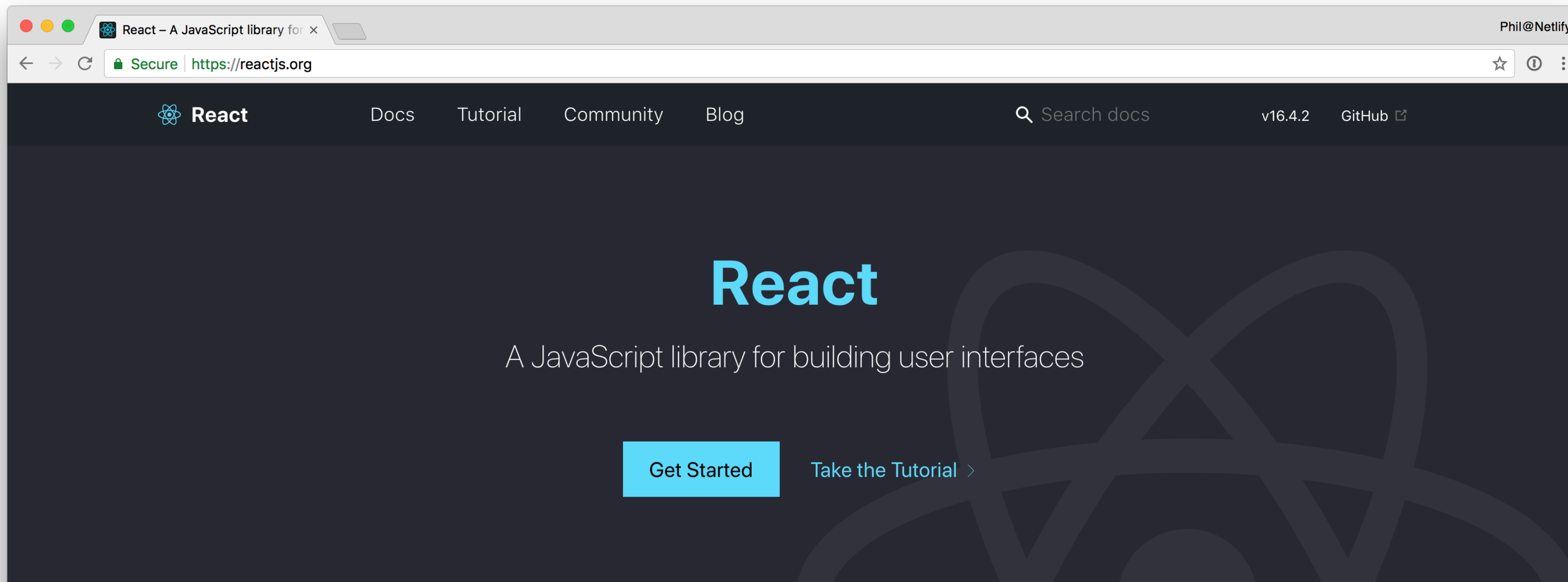


**OK! WILL YOU PLEASE
JUST SHOW US SOMETHING?**

PROBABLY MANY OF YOU, BY NOW

JAMSTACK SITES USING NETLIFY

REACTJS.ORG



Declarative

React makes it painless to create interactive UIs. Design simple views for each state in your application, and React will efficiently update and render just the right components when your data changes.

Component-Based

Build encapsulated components that manage their own state, then compose them to make complex UIs.

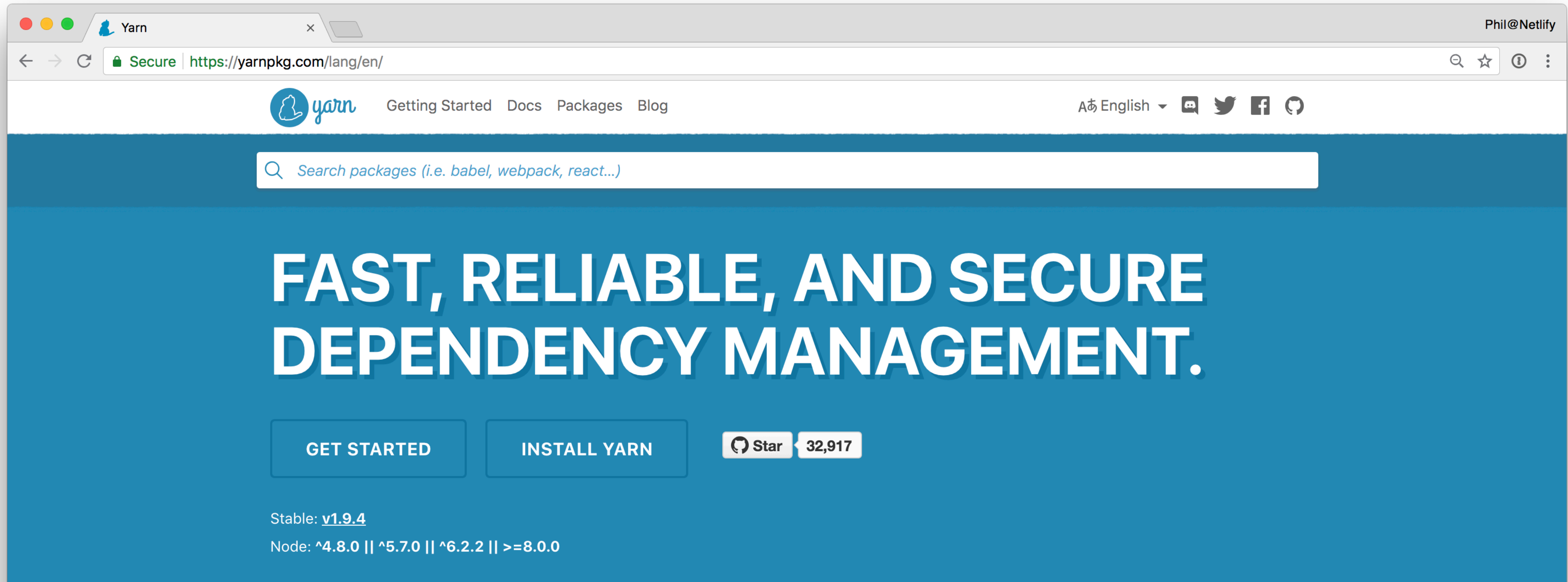
Since component logic is written in JavaScript

Learn Once, Write Anywhere

We don't make assumptions about the rest of your technology stack, so you can develop new features in React without rewriting existing code.

React can also render on the server using Node

YARNPKG.COM



The screenshot shows a web browser window with the URL `https://yarnpkg.com/lang/en/`. The page features a blue header with the Yarn logo, navigation links for 'Getting Started', 'Docs', 'Packages', and 'Blog', and social media icons for GitHub, Twitter, Facebook, and YouTube. A search bar is present with the placeholder text 'Search packages (i.e. babel, webpack, react...)'. The main content area has a large blue background with the text 'FAST, RELIABLE, AND SECURE DEPENDENCY MANAGEMENT.' and three buttons: 'GET STARTED', 'INSTALL YARN', and a GitHub Star button showing '32,917' stars. Below the buttons, the current stable version 'v1.9.4' and supported Node.js versions '^4.8.0 || ^5.7.0 || ^6.2.2 || >=8.0.0' are listed.

FAST, RELIABLE, AND SECURE DEPENDENCY MANAGEMENT.

[GET STARTED](#)[INSTALL YARN](#)[Star](#) 32,917Stable: [v1.9.4](#)Node: [^4.8.0](#) || [^5.7.0](#) || [^6.2.2](#) || [>=8.0.0](#)

Ultra Fast.

Yarn caches every package it downloads so it never needs to download it again. It also parallelizes operations to maximize resource utilization so install times are faster than ever.



VUEJS.ORG

The screenshot shows a browser window with the URL <https://vuejs.org>. The page features the Vue.js logo, a navigation menu with links for Learn, Ecosystem, Team, Support Vue, and Translations, and a main heading: "The Progressive JavaScript Framework". Below the heading are three buttons: "WHY VUE.JS?", "GET STARTED", and "GITHUB". A "Special Sponsor" section highlights "stdlib" as a "Function as a Service Platform and Library". Three key features are listed: "Approachable" (for those familiar with HTML, CSS, and JavaScript), "Versatile" (an incrementally adoptable ecosystem), and "Performant" (20KB min+gzip Runtime, Blazing Fast Virtual DOM, Minimal Optimization Efforts).

Vue.js

Secure | <https://vuejs.org>

Learn ▾ Ecosystem ▾ Team Support Vue ▾ Translations ▾

The Progressive JavaScript Framework

[WHY VUE.JS?](#) [GET STARTED](#) [GITHUB](#)

Special Sponsor

stdlib

Function as a Service Platform and Library

Approachable

Already know HTML, CSS and JavaScript? Read the guide and start building things in no time!

Versatile

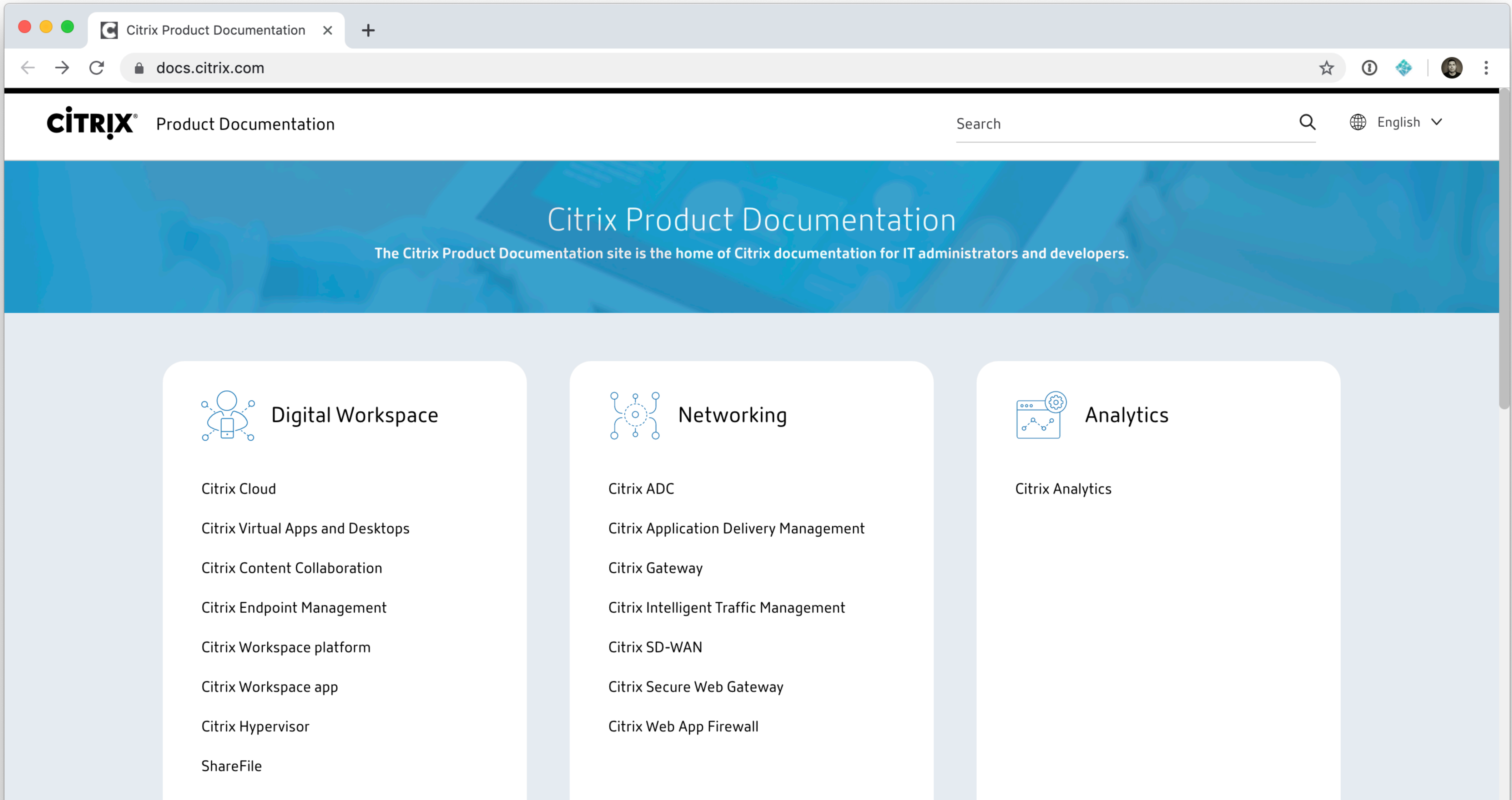
An incrementally adoptable ecosystem that scales between a library and a full-featured framework.

Performant

20KB min+gzip Runtime
Blazing Fast Virtual DOM
Minimal Optimization Efforts

Patreon Sponsors

DOCS.CITRIX.COM



SMASHINGMAGAZINE.COM

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 - Access to Smashing TV
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 - Discounts on tools & video courses (e.g.
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 - \$375 discount on 1 in-house training

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Smashing Magazine

Don't Miss These Latest Articles

Seriously, red?

- How To Start Using Sketch And Framer X** *Martina Pérez wrote*
Framer X ³ # Sketch ²³
- Increase Customer Centricity With Workshops** *Claire Mason wrote*
Business ²⁷⁷ # Ideation ¹² # Communication ⁶²
- When Do We Need A Design System? An Interview With Brad Frost** *Vitaly Friedman wrote*
Interviews ⁴¹ # Business ²⁷⁷
- Inspiring Wallpapers For A Colorful June (2019 Edition)** *Cosima Mielke wrote*
Wallpapers ¹¹⁸

6 DAYS AGO 7 DAYS AGO 9 DAYS AGO

Smashing Magazine

SmashingConf 2019–2020

Smashing Conferences are friendly, inclusive events for people who care about their work. No fluff, no fillers, no multi-track experience – just actionable insights applicable to your work right away. With live sessions on accessibility, performance, front-end, UX, CSS, JavaScript and interface design. Please respect **our code of conduct**.

What's SmashingConf Like? ↓

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@SmashingConf #smashingconf

- Toronto, Canada 🇨🇦 Jun 25–26, 2019**
Better front-end & UX workflow, web performance, service workers, cross-cultural design, animation, interface design, CSS Grid, Vue.js, designing for mobile, digital policy and new front-end adventures.
Explore all speakers and topics →
- London, UK 🇬🇧 Jul 9–10, 2019**
Serverless! Let's explore how to design, build, debug and deploy fast, modern web projects that run on the JAM Stack. Plus practical full-day front-end workshops.
Explore all speakers and topics →

PLATFORMS

from

5

to

1

**WE HAD SOME CACHING ISSUES...
WITH PROBABLY EVERY SINGLE
WORDPRESS CACHING PLUGIN
OUT THERE**

VITALY FRIEDMAN

SMASHINGMAGAZINE.COM TIME TO FIRST LOAD

from

to

800MS

80MS

OFFERS MANY POSSIBILITIES

thanks to

**AN EXPLOSION IN
TOOLS AND SERVICES**

STATIC SITE GENERATORS

staticgen.com

NETLIFY

www.netlify.com

VARIOUS RELATED RESOURCES FROM CHRIS COYIER

<https://serverless.css-tricks.com/>

CITRIX PRESENTATION FROM JAMSTACKCONF NYC

youtube.com/watch?v=kvS5h5domf0

JAMSTACK CONFERENCE

jamstackconf.com

HEADLESS / DECOUPLED CMS

headlesscms.org

ABOUT THE JAMSTACK / COMMUNITY

jamstack.org

THE NEW DYNAMIC

www.thenewdynamic.org/

THANKS

@PHILHAWKSWORTH