

Next.js App Router Architecture & Starter Kit Guide

Technical specification for performant, dark-mode web applications

01. Tech Stack & Engineering Core

- **Framework:** Next.js 14+ (App Router, Server Components & Streaming SSR).
- **Styling:** Tailwind CSS with CSS custom variables for tokens & dark mode.
- **Animation:** Framer Motion for layout transitions + vanilla requestAnimationFrame.
- **Deployment:** Vercel / Netlify edge network with automated CI/CD branch previews.

02. Directory & Route Hierarchy

- **app/layout.tsx:** Global root layout housing fonts, meta tags, and ambient backdrop.
- **app/(marketing)/:** Marketing route group sharing common nav and footer wrappers.
- **components/ui/:** Reusable primitives (buttons, modals, bento cards, badges).
- **lib/seo.ts:** Dynamic OpenGraph, Twitter card, and Schema.org JSON-LD generators.

03. Performance Optimization Playbook

- **Next/Image Best Practices:** Automatic WebP conversion, blur placeholders, and explicit sizes.
- **Font Subsetting:** next/font with Google fonts preloaded without external CSS requests.
- **Static Route Caching:** ISR (Incremental Static Regeneration) for lightning-fast edge delivery.

04. Development Quickstart

1. Clone repository: `git clone git@github.com:nuribuilds/studio-starter.git`
2. Install dependencies: `npm install --legacy-peer-deps`
3. Launch dev environment: `npm run dev` (accessible on localhost:3000)
4. Production build validation: `npm run build`