Marcelo Paiva

Design engineer

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I build design systems that let people and AI ship accessible products. I have spent two decades on enterprise software, from financial markets platforms at Thomson Reuters to HR and talent systems used by frontline workers. The systems live in code that engineers want to use, and I use AI coding agents every day to get designs into production faster.

WHAT I DO

- Design systems in code — tokens, component contracts, and the contribution path
- TypeScript, React, CSS and Figma. Design tokens as the interface between design and code
- WCAG 2.2, ARIA and assistive technology, as constraints designed around rather than audited for
- HR, talent acquisition and HCM product surfaces at enterprise scale
- Daily production work with Claude Code, plus the MCP servers and review gates that keep agent output on-system
- AI inside the product — retrieval, answers grounded in cited sources, and MCP servers that let an agent operate the platform with the permissions of the person using it, and no more

EXPERIENCE

Head of UX and Accessibility · ClearCo

Sep 2024 – Present

Talent management platform — applicant tracking, onboarding, performance.

- Moved design handoff from static files to working code. Designers and product managers ship pull requests through the same review gate as engineers, and drift found downstream flows back upstream as a PR against the template.
- Built the design system template repository that designers and product managers now build in: a running application on the real component library and tokens, with mock data, that installs on any machine without the legacy Windows stack.
- Wrote the design rules, accessibility standard and writing guidelines as markdown in the repository, so both people and coding agents read them before anything is generated. The platform conformance target is now answerable from the repo rather than from me.
- Set WCAG 2.2 AA as the target for the new platform and moved accessibility from an end-of-line audit into the components, where keyboard behavior, focus, structure and contrast ship with the starting material.
- Made deskless and mobile the default case: multi-tenant test data modeled on frontline customers — logistics, nursing, food service, higher education — so phone behavior is decided alongside desktop rather than after it.
- Built a proof-of-concept MCP server that lets an AI agent operate the platform through its existing REST API — over 160 typed tools across twelve HR domains, from requisitions to offer letters — with a streaming chat client that sends the model only the tools a message needs. The agent acts with the permissions of the person signed in and no more, and bulk actions are capped by schema.
- Led the team that built the in-product assistant into the template: chats grounded in the record on screen, reachable from every global search result, and question answering over the design system in which the model first picks the relevant reference documents under a structured-output schema, then answers only from them, with citations that link back to the source.
- Led a one-week proof of concept for contextual help, added without touching the product: a Chrome extension and an in-app guide that match the screen to articles by BM25 over a local index, and an agent that walked every screen and wrote the missing articles through an MCP server that can create drafts and has no code path to publish.
- Made erasure a tested property of what the assistant is grounded in. A build gate reads every string a model can be handed — system prompts, the search corpus, generated narratives — and fails if a person who asked to be forgotten appears in any of them.

CASE STUDIES

ClearCo: rebuilding a research and design team for agents

CCDS: a design system that ships itself

Letting an agent do the recruiter's job, with the recruiter's permissions

Our vendors' accessibility is our accessibility

Accessibility and User Experience Lead · AEM Corporation Apr 2023 – Sep 2024

The Rhonda Weiss Center for Accessible IDEA Data, which AEM leads under a multiyear U.S. Department of Education (OSEP) grant to improve state capacity to publish IDEA data accessibly.

- Led design and development of an accessible reporting system for IDEA Part B and Part C data — what states report on how children with disabilities are served — working with 80 stakeholders including disabled people.
- Extended the U.S. Web Design System with design tokens carrying accessibility decisions, so downstream teams inherited contrast, focus and categorical data palettes rather than re-deciding them.
- Ran 30+ usability studies with disabled participants, including blind and neurodivergent users, reaching the highest applicable conformance level on the delivered tool.
- Made equitable data representation the core design problem, and presented the approach at CSUN and Closing the Gap.

CASE STUDIES

Data about disabled students, in a tool they could not use

UX Manager — Portfolio and Great Place To Work · UKG (Ultimate Software / Kronos)

Apr 2018 – Mar 2023

Joined Ultimate Software on the recruiting team; Ultimate and Kronos merged to form UKG, an HCM suite used by 5,000 organizations and 15 million employees.

- Owned experience design across the portfolio — HR, payroll, recruiting, onboarding, performance and workplace culture analytics — and Great Place To Work alongside it.
- Led a team of 10 designers and researchers, and drove accessibility conformance across every product in it.
- Designed the employee belonging and DEI analytics hub, mapping demographic data against sentiment, including hiring funnel analysis by gender and ethnicity.
- Carried the HCM experience through a cross-platform rebrand without losing accessibility ground.
- Sponsored a framework-agnostic design system using Web Components, so one component set could serve micro-frontends written in Angular, Vue and React.

CASE STUDIES

UKG: asking 184 customers what they were trying to get done

Great Place To Work Hub: turnover and belonging, read together

Creative Director · ProcessMAP Florida · 2015 – 2016

- Built and led a team of 8 designers and developers, shipping a modern front end and a design system component library.

Creative Director · Sapient Global Markets New York · 2014 – 2015

- Introduced Lean UX practice, halving design iteration time and embedding designers inside agile delivery teams.

Founder · CrossTeam — Miami · 2013 – 2018

- Founded and ran a UX agency in Miami, while writing a bootcamp UX curriculum and leading monthly UX community events in South Florida.

User Experience Director · Thomson Reuters — New York · 2007 – 2013

- Led interaction design for Eikon, Thomson Reuters' financial markets platform, across wearables, smartphones and tablets.

Senior Designer · Verizon — Boston · 2004 – 2007

Technical Designer · Zefer — Boston · 1999 – 2004

Internet consulting.

- Designed for client projects at Fidelity Investments, Siemens and Citibank.

THINGS I HAVE BUILT

- atomic-cockpit (https://github.com/mpaiva/atomic-cockpit) — A control surface for running a team of agents across projects — planning, a human approval gate, and verification by an agent that did not write the code. A documented run: nine checks passed, fourteen minutes from approval to proof, one dollar ninety-eight.
- WCAG Plugin for Figma (https://www.figma.com/community/plugin/1373362852131056921/wcag-plugin) — Free and open source. Guideline search, annotation cards, and accessibility utility tokens imported as Figma variables, so the accessible choice is the default one.
- No Latin (https://nolatin.com) — Turns content blocks into an accessible HTML prototype, so screen reader users can be included in research on day one instead of being excluded by placeholder text.
- a11y-tips-statusline (https://github.com/mpaiva/a11y-tips-statusline) — All 87 WCAG 2.2 success criteria in the Claude Code statusline, rotating while you work, with a /wcag search command. One-line install.
- wcag-mcp-server (https://github.com/mpaiva/wcag-mcp-server) — WCAG 2.2 as an MCP server, so a coding agent can look a criterion up mid-generation instead of guessing at it. Works with Claude Code, Cursor and VS Code Copilot.
- Atomic (contributor) (https://github.com/bastani-inc/atomic) — Accessibility contributions to the open-source coding agent runtime by Bastani.ai: a WCAG contrast gate over the interactive theme, measured against rendered output rather than declared colors.
- docuseal-a11y (https://github.com/mpaiva/docuseal-a11y) — A fork of DocuSeal, the open-source DocuSign alternative used for onboarding signatures, changed across its Rails views and Vue front end in a codebase I did not write: landmarks, alt text, accessible names on icon buttons, and keyboard support for the custom elements that do the signing.
- This site (https://github.com/mpaiva/jupiter) — Next.js and TypeScript with a hand-rolled token layer. CI fails the build if any color pair drops below WCAG AA in either theme, or if any image ships without alt text. A Cloudflare Worker in front of it calls two model providers — one draws a new illustration, one writes its alt text from the result — behind five guards run cheapest first: request shape, a single-use bot check, a per-visitor limit, a global daily budget, and only then the paid call. Visitors cannot send a prompt, and keys never reach the browser.

STANDARDS AND TEACHING

- Invited Expert, W3C Accessible Platform Architectures (APA) Working Group, since December 2025 — the group reviews emerging web standards for their effect on disabled people.
- Contributing to W3C specification discussions since 2019, with authored proposals to ARIA Practices (aria-owns with late-mounted descendants), WCAG 3 (a content API), and the AI Accessibility work (including disabled people as AI content creators, not only as end users).
- Authored a 10-week UX curriculum for a design bootcamp and taught it to over 200 entry-level designers.
- Coach design and product teams on design systems, accessibility and working in code.

SELECTED SPEAKING

- **Into Design Systems**, 2024 — Creating accessible design systems; WCAG tokens as design decisions
- **CSUN Assistive Technology Conference**, 2022–2024 — Rapid prototyping with accessibility in mind; design tokens for equitable data representation
- **ATIA, Assistive Technology Industry Association**, 2024 — Design tokens for equitable data representation; involving people with disabilities in design
- **NTEN Nonprofit Technology Conference**, 2024 — How to involve people with disabilities in the design process
- **W3C TPAC**, 2023 — Design tokens for accessibility settings
- **Closing the Gap**, 2023 — Designing accessible data tools for inclusive education: IDEA data reporting
- **ICT Accessibility Testing Symposium**, 2020 — Focus first: a new front-end approach — Best Presentation award

EDUCATION

- Electrical Design — State Center of Technology Ferreira Viana, Rio de Janeiro