



WORK

ESSENTIAL PRODUCTS

VP of Design
[2015.06] – present

Design leader. Cultivate creative talent while executing dozens of design and engineering projects. Product manager. Balance CEO vision, technical constraints, market fit, project resources, team will. Individual contributor. Lead part-level ID & PD work, guide UI/UX, support marketing and executives.

- First hire. Responsible to CEO for all ID concepts, ME/PD architectures, JDM bring-up & handoff for 24 shipping products.
- Developed a flagship smartphone, world's smallest 4K-360° camera, numerous accessories, in 18 months with ~10 people.
- Oversaw R&D, secret-sauce tech. Lead on dozens of patents. Built all CAD masters. Led CMF, artwork, packaging, OOBE.

STANFORD UNIVERSITY

Adjunct Lecturer
2016.04 – present

Student mentor. Guided senior undergrads in product design through their capstone project class.

- Facilitated career planning discussions, wrote graduate school recommendations, and guided job searches.
- Coached a diverse body of students to bring nuance and professionalism into their nascent design practice.

PLAYGROUND GLOBAL

Director of Design Studio
2015.04 – 2017.04

Team leader. Built and oversaw a world-class design team within a new VC fund / hardware accelerator. Discipline integrator. Simultaneously helped multiple startups hire and fuse UX/ID/ME/MFG teams. Startup coach. Worked with entrepreneurs to develop strategies, MRD & PRDs, designs, architectures. Execution supervisor. Ensured products stayed on time & budget, shepherded teams, assisted builds.

- Oversaw and influenced design of all hardware products, starting with market strategy & handing off at ramp.
- Projects included: AR gaming, autonomous drones, 360° & 3D camera systems, smart car tools, wearable speakers.

LYTRO

Director of Design: Product
2010.11 – 2015.04

Design director. Responsible for all product direction and industrial design, reporting to CEO & CPO. Product definer. Acted as product manager, creative director, mechanical architect, brand evangelist. Founding engineer. Led ME/PD with in-house & external teams. Oversaw JDM & OEM manufacturing. Development facilitator. Bridged all customer-facing disciplines including ID, UI, ME / PD, EE, FW, SW.

- Completely responsible for any and all physical goods, including: cameras, smart accessories, soft goods, packaging.
- Lone PD/ME overseeing ID, UX, ME, MFG. Spent 60% of year abroad. Built the first consumer lightfield camera.
- Balanced design initiatives with execution metrics, fusing aesthetics with technical excellence in DFM, DFA, Ops.
- Co-directed internationalization: certification compliance, localization, marketing, and authorized sales bring up.
- Qualified new vendors and processes, traveling to Asia to manage 2nd & 3rd tier vendors, achieving 1st tier quality.
- Pitched design & product initiatives to Board of Directors and investors. Regularly gave interviews to mass media.
- Shipped 2.9 cameras, 20 accessories, 27 boxes, 2 UIs, 4 patents, 2 marketing launches, 2 roadmaps, 3 T-shirts.

ONE & CO / HTC

Industrial Design Engineer
2010.05 – 2010.11

Design tactician. Guided design teams through engineering & manufacture of excellent smartphones. Innovation champion. Provided on-demand expertise to creative and technical teams in Taiwan & USA.

- Managed input from C-suite, ID, ME, OEMs to streamline design process. ID & UX researcher. C2 CAD sculptor.

MIGHTY MITAD ETHIOPIA

Pro-Bono Product Developer
2008.04 – 2009.09

Affordable technologist. Locally studied, developed, launched low-cost upgrade for stoves in Ethiopia. Profitable in one month, selling a product that saves the nation's poorest 15% of their annual income.

- Developed a compressive band that pre-stresses clay for shock resistance, retails for \$2 and saves families \$30/yr.
- Designed low-cost sheet metal tooling in Africa to match capabilities of local, low-skill vendors – kept costs < \$300.

STANFORD PRL

Shop Teaching Assistant
2008.09 – 2010.03

Prototyping mentor. Guided students from vague ideas to built products in Product Realization Lab. Personal coach. Taught the relationships between craft, exploration, design, and life development.

- Kept 700+ shop users safe and informed while ensuring all machinery and projects ran smoothly. Widely beloved.

APPLE

Manufacturing Process Development Engineer
2005.10 – 2007.10

Manufacturing innovator. Responsible for taking new ID concepts from the studio into mass-production. Factory supervisor. Managed execution across Asia, installing new technologies & ramping production.

- Member of tight R&D team leading maturation, install, & ramp of new mfg processes. Covered every major product.
- Drove \$25 million laser-cutting tech purchase in Germany, transferred equipment & expertise to China & Japan.
- Oversaw production of 350K parts / day; 500 CNC mills, 60 5-axis lasers, 25 injection presses, 7 countries, 6-sigmas.

LIGHT AND MOTION

Mechanical Engineer
2004.05 – 2005.10

Lead design engineer. Created camera systems for SCUBA divers and high performance bike lights.

- Responsible for 26 product releases, covering all CAD, FEA, prototyping, testing, GD&T technical drawings.
- Modeled thermal performance of solid state lights and associated performance impacts on LED light output.

FREELANCE

Designer, Engineer, Strategist
2001.06 – present

Strategic pragmatist. Provide rich, rapid, robust assistance in taking great products from idea to launch.

One & Co: cosmetic manufacturing strategies. **Kickstarter, Inc:** strategy for oversight of 'Product' category.
Boosted Boards: pre-EVT design reviews. **Driptech:** interim COO, subsistence farm field research in India.
D2M: fixture developer, lab monkey, design intern. **Edge Innovations:** hydraulic robot animatronics for Hollywood.
Stealth Startups: advising how to ship goods well. **Northrop Grumman:** nuclear submarine seal longevity testing.

EDUCATION

STANFORD UNIVERSITY

2007.09 – 2010.03

Product Design

Master of Science

STANFORD UNIVERSITY

1999.09 – 2003.06

Mechanical Engineering

Bachelor of Science

SKILLS

Creo PRO/E: Class-A, C2 cosmetic surfacing / master models.
Adobe Illustrator: pretty good, but definitely not amazing.
MFG: global experience from one-offs to mass-production; general cosmetic DFX, colorimetry; 2+ cumulative yrs in Asia.
Personal: luthier, framebuilder, father of 2, partner to surgeon.

QUOTES

Andy Rubin – "An amazing talent - genius level." "Incredible work... depth of your passion & commitment."
Jony Ive – "I just got out of an outstanding meeting - just outstanding. It was reviewing all the work that [Dave's] been doing on [redacted]. It was a perfectly timed reminder for me about all that is great about our company."
Artefact – "We've been coming up with exciting product concepts for years, obsessing about clean proportions, clear form & quality materials; but we've never met a client who was as committed to delivering on that promise."
Kanye West @ A16Z – "This camera is dope, who designed this? I wanna meet that guy, this thing is fresh."

AWARDS

IDSAs: ID Bronze 2012 - Lytro
iF: ID Award 2018 - Essential
GOOD: ID Award 2014 - Lytro
Core77: ID Gold 2012 - Lytro
Patents: lead inventor on 29
UI/UX Bronze 2012 - Lytro
ID Award 2018 - Essential
ID Award 2012 - Lytro
Dieline: Tech Silver 2013
Cookies: best in the world