

Instant Drone Factories for Front-Line Labs

 $Print \rightarrow Snap \rightarrow Hover in 24 hours$

(Investor Deck · July 2025)

The Mission

Title: Rearming the Edge – Overnight

Drooid turns every unit lab into its own Blue-compliant drone factory. No shipping. No wait. Just print, snap, and fly.

¹Blue = NDAA-approved parts list

The DoD's New Bottleneck – No Local Drone Manufacturing

• Blue sUAS Block 4 RFI (Apr 2025)

"Unit-level labs must be able to redesign and produce air-frames themselves." Implication \rightarrow Local CAD-to-print loop is mandatory.

• Project G.I. launch (Jun 2025)

"Ready-now, less-exquisite sUAS scalable in weeks."

Speed & simplicity beat new features; frames must be field-built.

Replicator Initiative FY-26 objective

Thousands of attritable systems per quarter via distributed production.

Market Misdiagnosis – More Factories ≠ Mission-Ready Drones

"Hype" Talking Point	Ground Truth from DoD Docs
"Re-shore more drone factories."	Most plants are already on-shore; the choke-point is 8 – 20 week delivery to front-line labs (Blue sUAS RFI).
"Just ship more finished airframes."	Blue sUAS Block 4: Unit labs must redesign and print frames themselves in < 24 h.
"Tariffs will fix it."	Cost is secondary; lead-time and cyber vetting are the blockers (Replicator & Project G.I.).

Central megaplants still ship by truck or sea-lift and miss the 24-hour edge timeline.

DoD now asks for local, cyber-verified manufacturing inside unit labs.

Job to Be Done — Inside a Unit Lab

Situation	Task	Must-Haves
Cracked frame after hard landing	Flight-safe replacement before first light	No soldering, zero shipping
New payload at 1700	Integrate & launch before dawn raid	SBOM auto-signed, no vendor queue

24-hour success bar: CAD tweak → hover with SBOM auto-signed on site.

Market Scale & Urgency — A Funded Gap Too Big to Ignore

- 700 + DoD unit labs already own SLS / MJF printers (CapEx is sunk)
- Group 1–2 sUAS spend ≈ \$4 B / yr (FY-25 procurement + sustainment lines across Army, USMC, USAF, Navy, SOCOM)
- Replicator mandate: thousands of attritable drones every quarter
- DIU business-case target: shift 10% of frames to on-base printing
- Budget unlocked:

\$4B annual spend

- × 10% local-print phase-1
- = \$400 M service-addressable wedge

Gap: No vendor today delivers a full, Blue-compliant lab tool-chain

What Is a Unit Lab?

Asset on site	Example gear	Already funded
Industrial SLS / MJF printer	Formlabs Fuse 1, Markforged X7	✓
Bench CNC & re-work	Bantam Tools, Hakko FX-888	✓
2-4 tech soldiers	Warrant officer + enlisted makers	✓

A unit lab is a "maker space in uniform."

Every brigade, ship, or depot already owns the tools above and turns out brackets, radio mounts, and antenna housings every day.

² Additive-manufacturing doctrine: DoDI 5000.93 (2022); DEVCOM "ExLab" field report (2025).

Why Unit Labs Are the Pivot Point

Pain	Central Factory	With Drooid stack
Replace cracked frame	8–20 wk reorder	< 24 h print & fly
Indo-Pac resupply	30–60 day sea-lift	Same-base print
Cyber compliance	Manual SBOM audit	Auto-signed SBOM
Iterate design	Vendor queue	Tech edits CAD, prints overnight

Take-away

The bottleneck is *not* more megaplants.

It is giving these already funded labs the software stack to print Blue-compliant airframes on demand.

That stack is Drooid.

What Unit Labs Have vs. What They Still Need

In-Lab Today (sunk cost)	Still Missing	Why It Matters
SLS / MJF printer	Certified drop-in parts kit	No CapEx hurdle
Nylon powder on shelf	One-click cyber paperwork	Gear already at Indo-Pac bases
2–4 tech soldiers	Software to go from CAD to flight in < 24 h	Air-gapped, cleared staff—secure under cyber attack

Proposed Solution — Software Stack Built for Unit Labs

Drooid equips the gear and people that already exist:

- 1. Forge CLI 3-min parametric frame & signed SBOM
- 2. Blue Rail Kit snap-fit avionics, zero soldering
- 3. **TPM write-back** firmware + SBOM hash before first flight
- 4. Offline by design air-gapped printers already in the lab
- 5. Licence + cryptographic binding every frame tied to Forge key

Design → print → hover in under a duty shift.

That closes the 8–20 week gap central factories can't touch.

Prototype Roadmap

Phase & Output	Proof
Forge CLI v0 + rail + flash script	Demo clip · Git hash (data-room link)
24 h print-to-hover demo (Newlab Detroit)	Live video
Field KPI 10 frames / shift	SBOM + TPM hash each

Goal: replicate loop in pilot labs and file Blue sUAS & DIU SBIR Phase I.

Why Incumbents Can't Pivot, but Drooid Can

	Big Primes	Tier-2 Integrators	Drooid
Build method	Central factory molding	Import cheap shells	Print in-lab
Lead-time	8-20 weeks	4-12 weeks	< 24 hours
Compliance + \$\$	Closed SBOM, \$15k-\$60k HW margins	Manual SBOM, kit margins	Auto-SBOM, licence + rail fees
Edge autonomy	Re-order every break	Still wait on shipping	Print • Snap • Fly

Future Impact – A Drone Factory in Every Platoon

2030 vision: Any allied unit prints, certifies, and flies a mission-ready drone the same day a new threat appears.

- Thousands of micro-factories replace today's handful of mega-plants
- Mission-tailored drones born at the edge zero sea-lift, zero foreign dependency
- Software licences, not hardware trucks, power allied air autonomy

From First Print to Full Swarm

Starting Point	Next-Gen Variants	Scaling Potential
Initial prototype Blue-compliant nano quad "bee" (≈ 250 g) printed overnight	Mission-tuned bodies • Crawlers for tunnels • Swimmers for hull scans	Full library Edge-printed land·sea·air library
	 All reuse the same 	
	rail core	

One software stack + rail core scales across all domains.

Market Size

Metric	Definition	Value
TAM	All DoD Group 1-2 drones	≈ \$4 B /yr
SAM	First 10% shift to labs	≈ \$400 M /yr
SOM (3 yr)	250 labs × (\$50 k licence + \$210 k rail)	≈ \$65 M ARR

Offer & Funding Plan

- Raise: \$100 k SAFE at \$1 M cap
- Use of funds: live hover demo compliance loop pilot letter rail-kit tooling

"We're not trying to out-Skydio Skydio. It's about giving every unit the power to manufacture drones where and when they're needed."

Team & Contact

- Fitz Doud Co-Founder
- Daniel Kalu Co-Founder
- Newlab @ Michigan Central R&D access (no equity)

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Join us in building software-defined drone factories for the next generation of defense.