

WHITE NOISE ACADEMY

Induction · WNA · 2026

Forward Deployment Associate

White Noise Academy: An Induction Docket for Fresh Engineers

White Noise Academy

Hyderabad, India · with the dKube / One Convergence forward-deployed engineering practice · Cohort 1 hosted at GIET, Gunupur

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Abstract. This docket is the constitution of the White Noise Academy's engineering programme. It states who we are, what we believe, how we work, and what we owe each other, so that every person who joins the family, whether as a fresh engineer, a mentor, a patron, a member, a customer, or a contributor, reads the same text and signs the same undertakings. We describe the Academy's lineage from music and school education to forward-deployed engineering; the mission of turning fresh engineers into founders through one loop a day, every solution ending in hardware and a customer, shipped in public at AI speed; the genomic rules that govern how we build; the ethics, code of conduct, confidentiality and health rules that bind us; the eight-stage Solutions Development Lifecycle; the daily Loop and the sixteen-week curriculum; the radar by which work is measured and autonomy is earned; the channel and its twenty content lanes; and the terms of reward, growth and governance. Appendices carry the schedule, the curriculum table, the lanes catalogue, the forms to be signed, a glossary and the bench safety checklist.

Keywords: forward-deployed engineering · genome method · solutions development lifecycle · small language models · instruments · open source · code of conduct · induction · curriculum · radar

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How to read this docket

Read it twice. The first time straight through, in one sitting, so the shape of the place is clear. The second time with a pen, marking every sentence you disagree with, because the docket is ratified at induction and every cohort may propose amendments through the process in the governance section.

The document is in four parts. Part I says who we are and what we make. Part II is the genome: the rules, the ethics and the conduct that do not change from project to project. Part III is how we work day to day: the lifecycle, the Loop, the curriculum, the radar, the channel, the tools. Part IV is growth and gov-

ernance: what you earn, how the family grows, and how the docket itself is changed. The appendices are the working sheets you will actually pin above your bench.

You sign five things at the end: an acknowledgment of the code of conduct, a non-disclosure acknowledgment, a consent for camera and code, a health declaration, and the sign-off. Nothing in the docket is a suggestion. Where a rule is enforced, the text says so. Where a matter is judgment, the text says that too.

PART I · WHO WE ARE

1 Introduction

Writing software is no longer the scarce thing. A person with an AI seat and an afternoon can produce a working application, and by next year the same person will produce it before lunch. This changes what an engineering education is for. When code is cheap, the value moves to the three things that remain expensive: a customer who actually cares, a domain the large laboratories will not bother with, and the speed to iterate once you have the first two. The Academy exists to teach those three, and to teach them by doing rather than by describing.

We work with fresh engineers deliberately. A fresh engineer arrives with strong theory, no production habits, and learning receptors that have not yet been dulled by a decade of one stack. That is the best possible material for the method we use, which asks a person to express whatever faculty the problem in front of them demands, and to learn how to learn faster than the field moves. An engineer with ten years in one layer has to unlearn before they can do this. A fresh engineer only has to begin.

The Academy does not start from nothing. Over the past year the practice behind it has shipped more than eighty production-ready solutions across health, agriculture, law, education, infrastructure and developer tooling. It owns a build pipeline that goes from a written intent to a deployed application with its own domain; a secure mesh that runs the same solution on a customer's premises and in the cloud; a testing platform; a virtual Kubernetes engineer; and a way of documenting and demonstrating work that clients can click rather than read. That machine already exists. A new cohort is the next batch of people trained inside it, and the machine gets better every time a cohort passes through, because every cohort leaves the documents truer than it found them.

Our bet is stated plainly so that it can be tested. One engineer who owns a whole solution end to end, with AI beside them, is more productive than ten people passing work down a line. We prove it in public, on a live channel, with a customer at the end of every loop, and then we hand the graduates the keys to recruit the next cohort.

2 Vision, mission and the family

2.1 The mission

We turn fresh engineers into founders: one loop a day, every solution ending in hardware and a customer, shipped in public at AI speed.

Every clause carries weight. *Fresh engineers* because that is who we take and who we are best at growing. *Founders* because the outcome is ownership, not employment: a person who can find a customer, build the solution, ship it, tell its story and sell it, and who has done so in public where the record cannot be disputed. *One loop a day* because the unit of progress is the daily cycle from theory to bench to code to broadcast, and a day without a shipped artifact is not a day of work. *Hardware and a customer* because a solution that can be held and a person who paid for it are the two things that cannot be faked. *In public* because trust is built by being watched. *At AI speed* because velocity is the name of the game, and the tools now make a pace possible that was unthinkable two years ago.

2.2 The vision

We see an Academy that is also a company, where teaching and shipping are the same activity, filmed once and sold forever. We see instruments, not apps, leaving our bench and entering people's hands. We see small, sovereign models that speak the languages the large laboratories ignore. We see a channel whose viewers become patrons, whose patrons become customers, and whose customers become the next cohort's first assignments. We see graduates who lead verticals and recruit their own teams from the hundreds who applied and were not yet selected. And we see the whole of it written down, so that another college in another state can run the same playbook.

2.3 The family

An organisation is not an organisation chart. It is an organism, and it grows by addition. We describe the family as concentric circles, each with its own way in and its own obligations under this docket.

Circle	Who	How they join	What binds them
Engineers	Fresh engineers in cohorts; graduates who lead verticals	Assessment, selection, induction, this docket in full	Every section; the induction form
Core team	The experienced eight who carry each cohort	Appointment by the council	Every section; mentor undertakings
Patrons and members	People who follow the process live and back it; paying members of the academy	The channel; the members area	Community norms; the public-by-default terms
Customers	The named person behind every solution	Discovery; the named-customer rule	Customer terms; data and IP clauses in Section 12
Contributors	Developers and makers who work on the open repositories	A pull request that passes the immune system	Code of conduct; the open-source licence
Partners	Institutions, companies, laboratories, colleges	Agreement with the council	Partner agreement; ethics and conduct

Table 1. The family as concentric circles. Membership of an inner circle implies the obligations of every outer one.

The circles are not ranks. A patron who becomes a customer, a contributor who joins a cohort, a graduate who returns as core team: the movement between circles is the health of the organ-

ism, and the docket is written so that movement is always possible and always earned.

3 Lineage: from music to code

The Academy did not begin with engineering. White Noise Academy began in Hyderabad as a place where children learned music, arts and film production seriously, with graded certification from the Rockscool examinations board in London, and it grew into a school of holistic education: a full-time home-schooling programme, an after-school Root Skills programme for younger learners, and the Whitenoise Teen Accelerator Program, which describes itself as India's first holistic teen accelerator and combines AI-driven education with real-world projects across eighteen career tracks and a nine-step learning framework. The Root Skills programme organises its work into three modules that still describe us well: technology innovators, creative visionaries, and digital storytellers.

That history is why this docket reads the way it does. We treat an engineer the way a music school treats a musician: daily practice, graded gates, public performance, and a portfolio rather than a certificate. We treat a product the way a film school treats a film: it is not finished until it has been shown to an audience. And we treat a classroom the way a studio treats a session: it is recorded, and the recording is the product.

The engineering practice came through a partnership with dKube and One Convergence, whose forward-deployed engineering training defined the genome method that Part III adopts: an engineer is not a label but a cell, expressing whatever faculty the field demands. The training's operating loop of understand,

formulate, optimise and ship, its gates, and its rule of manifestation over certification are all carried into this docket with attribution.

3.1 Faculty and mentors, as published

The Academy's public faculty, as listed on its programme sites, are Dr Shruti Arya, Curriculum Director; Anuradha K, Mathematics; Krithika, Creative Arts; Sagar Gaikwad, Music, Curriculum and Production; and Haritha H, Primary Years inquiry faculty. Its published industry mentors are Vinai Kolli, embedded systems, Vice President at DKube, with more than thirty years in the field; Lata Murkot Ramuny, sales leadership at the Taj and Tata groups; Sunila Gollapudi, a Director at Google; Girish Marar, artist and sculptor, founder of Greekbay; and Bhupesh Kumar, systems design at Verizon and Wells Fargo. These names are recorded here as the Academy publishes them, so that a new engineer knows whose shoulders the programme stands on. The core team that carries a cohort day to day is described by role in the next section, and its names are added to each cohort's edition of this docket before printing.

The Academy is based on the sixth floor of Brigade Towers in the Financial District, Gachibowli, Hyderabad. Cohort 1 of the engineering programme is hosted at GIET in Gunupur, Odisha, from where the first engineers were selected through the Code Arena assessment.

4 The core team and the mentorship model

Every cohort is carried by an experienced core team of eight. The number is not incidental. It matches the eight stages of the lifecycle in Section 16, so that every stage has a person who has

done it in production and can be called to the bench. The roles are fixed; the names are added per cohort.

Role	Carries	Touchpoints
Training lead	The morning First Principles block; the curriculum; the gates	Daily 09:15; Friday review
Communication coach	The Voice hour; pitches; the narrative of every piece	Daily 13:30
Physician	Health rules; weekly check-ins; fitness to work	Weekly; on call
Physiotherapist	Posture, bench ergonomics, movement during long days	Weekly; on call
People and HR lead	Conduct, reporting path, confidentiality, contracts, growth records	Induction; monthly; whenever asked
Bench and silicon lead	Fabrication, PCB, FPGA, firmware, lab safety	Daily 10:00; hardware stage reviews
Content and production lead	The channel, the lanes, the handouts, the members area	Daily 18:30; Thursday publish
Forward-deployment lead	Customers, the named-customer rule, field deployment, the radar	Daily 15:30; Friday radar

Table 2. The core team of eight, by role. Names are entered in each cohort's edition.

Mentorship works in three modes. *Scheduled*: each role owns a block of the Loop and is present for it. *On call*: during Forward Deployment any engineer may summon any mentor to the bench, and the mentor comes; the rule is that a mentor never solves the problem, they ask the question that lets the engineer solve it. *Gated*: at each of the four gates in the lifecycle, a mentor of the relevant stage signs that the exit criterion is met, and the signature is recorded on the radar. The core team also sits as the council described in Section 29.

The mentors are bound by this docket exactly as the engineers are, and by three further undertakings: to teach in public, so that their sessions are recorded and become the members' curriculum; to score on evidence only, never on impression; and to escalate a health or conduct concern the same day they notice it.

5 What we make

5.1 Instruments, not apps

Every solution the Academy ships ends in hardware, however small. A device you can hold, with knobs and sliders that look and feel like a mixer or a piece of studio gear, and a digital brain inside: a small language model, an agent, a bridge into the legacy systems that run real factories and laboratories, such as LabVIEW, Verilog and the industrial buses. The user interface behaves like a digital audio workstation or a plug-in, with physical controls that map to real parameters, and beneath it the integration goes as deep as the customer's oldest equipment. This is the opposite of a white box with three buttons that opens a chat window. An instrument is built for one domain, does one job extremely well, and is beautiful in the way that tools people use every day become beautiful.

We say instruments, not apps, because the phrase decides what we will not do. We will not ship a web page and call it a product. We will not ship a chat window and call it intelligence. We will not ship a generic device and call it a solution. The product line, and the product identity inside the Academy that carries the Foundry name, is a line of instruments, and the software is what makes them think.

5.2 Two product lines

Line 1: domain small language models. Narrow, owned, and trained on data nobody else has: Odia and the other languages the large laboratories ignore, agriculture, the clinic, the college

itself. A small model that does one task in one language for one kind of customer beats a large model that does everything for no one in particular, and it can run on a device the customer owns. This line sells to organisations that want their own model and cannot get one from a laboratory in another country. The fine-tuning platform that produces them already exists in the practice.

Line 2: the fab and custom-instrument line. We do not invent new boards. We take a customer's need and turn it into a kit, a printed enclosure, an ordered circuit board bundled with an ESP32 or an Arduino, or a custom design workshop in which the customer builds it with us. This line grows by customers outsourcing their small hardware needs to us, and by collaborations that make noise. Over time it becomes the body for Line 1's brain.

5.3 The channel as the front door

Both lines share one front door: the channel, and the hundred patrons who follow the process live. We are not chasing a million viewers who watch for fun. We are earning a hundred people who trust us because they watched us build, who back the process, and who become the first customers of the custom work. The way to earn them is to show, on camera, that the fears about AI collapse once the process, the skills and the agentic frameworks are built from the ground up, and that velocity follows. The channel, its lanes and its membership are described in Section 21.

WHAT THIS MEANS ON MONDAY

- You will be asked, at every review, who used what you built and what they said. Not what you built.
- Your solution is not finished until something can be held.
- Your first customer is a person with a name, in the college or the town, reachable this week.
- You are on camera by default. The recording is the product as much as the code is.

6 The voice-first and analogue approach

What we make is recognisable before the logo is seen. This section states the design philosophy behind every Academy product, so that an engineer in week one already knows what an Academy instrument must feel like and what it must never be.

6.1 Voice first

The first way to use an Academy product is to speak to it. A person says what they intend, the system reasons and acts, and it narrates back what it started, what it finished and what went wrong, without the person having to watch a screen. This is not a novelty layer on top of a keyboard product. It is the accessibility layer: eyes-free, hands-free, and approachable by a person who has never used a terminal and never will. The terminal remains the power-user surface. Voice is the surface that needs no terminal at all. Every product is judged against one question: does it let a person do by voice what they would otherwise do by typing? The consequences are a reliable voice loop, proactive narration, continuity across sessions because there is no scrollbar to read, and support for the languages our customers actually speak.

6.2 The analogue board

The second way to use an Academy product is to touch it. Where a product has parameters, it has physical controls: knobs with detents, faders, switches, meters and small displays, laid out the way a mixing console or a studio effects unit is laid out, because that idiom has survived sixty years of use by people under pressure. The digital audio workstation and the virtual studio technology plug-in taught a generation that a parameter can be a knob on a screen. We complete the circle and put the knob back in the hand, mapped one to one to the same parameter, with the on-screen replica showing exactly what the board

shows. A small analogue-looking device with a digital brain inside is more trusted, more understood and more loved than a black box with three buttons, and it can be operated without looking.

6.3 Old-school interfacing

Beneath the board is a discipline that predates the web. We read the datasheet before we reach for a library. We know the register map. We speak the buses, serial, I2C, SPI, CAN and Modbus, with a probe on the wire, and we bridge into the systems that run real laboratories and factories: LabVIEW, Verilog on programmable logic, ladder logic on controllers, and the serial protocols of instruments older than the engineers using them. A product that cannot talk to the customer's oldest equipment is not deployed; it is demonstrated. Multi-bus communication, a legacy bridge and deterministic timing are core skills of the curriculum for this reason, and the bench and silicon lead signs the hardware gate on them.

6.4 Design language

Typography is set in faces that were designed for reading, on paper and on panels, and the same faces appear in our documents, our screens and our printed scales. Colour is used to mean something, never to decorate: a meter in the red is a warning, a knob ring in a colour is a mode. Panels are laid out in the order the operator uses them, left to right, top to bottom, with the most-turned control largest and nearest the hand. Enclosures are metal where metal can be used, with printed inserts where a shape demands it. Every instrument must be understandable by someone who has never seen a screen, and every screen must be understandable by someone who has never seen the instrument.

WHAT THIS MEANS ON MONDAY

- Your solution has a voice path and a physical control before it has a settings page.
- You know the register map and the bus before you know the library.
- The panel is laid out by use, not by symmetry, and the screen mirrors the panel.

PART II · THE GENOME

7 The genomic rules

The genome is the set of rules that every cell of the organism carries, whatever it is currently expressing. They are not project conventions, which change with every customer, and they are not preferences, which change with every mentor. They are the constraints that make the Academy's work recognisable as ours. Each rule is stated, explained, illustrated, and given its anti-pattern, so that nobody can honestly claim not to have understood it. Where two rules pull against each other, the rule with the lower number yields to the higher-numbered constraint only when this docket says so; otherwise the council decides.

7.1 Addition, not substitution, under a space constraint

STATEMENT. When the limit is space, whether in a codebase, a product, a document, or an organisation, we grow by adding a new cell beside the old one. We do not bulldoze what works and replace it.

WHY. Substitution destroys the evidence of what came before, and with it the reason the old thing was built. Addition preserves the lineage, lets both versions run while the new one earns trust, and makes rollback a matter of pointing rather than rebuilding. Tissue grows by mitosis, not by demolition.

EXAMPLE. A new version of the assessment platform is born as a new directory with its own genome file, registered on its own port, and exposed on its own path, while the old one keeps serving the students who are mid-test.

ANTI-PATTERN. Rewriting a working service in a new framework because the new framework is more pleasant, and deleting the old one the same afternoon.

7.2 Substitution, not addition, under a time constraint

STATEMENT. When the limit is time, we replace rather than pile on. A component that is slowing the loop is swapped for one that is not, and the swap is recorded.

WHY. Under time pressure, addition produces layers: a workaround on a workaround, each faster to write than the fix and each slower to run. Velocity is the name of the game, and the only sustainable way to keep it is to keep the loop short. Substitution keeps the number of moving parts constant while the speed improves.

EXAMPLE. A verification step that takes forty minutes is replaced by one that takes four, with the same acceptance test, rather than made optional or moved to a nightly job that nobody watches.

ANTI-PATTERN. Adding a cache in front of a slow query, then a queue in front of the cache, then a retry around the queue, when the query itself could have been rewritten in an hour.

7.3 Uniqueness

STATEMENT. One source per fact, and one reason per product. Every fact about the organism lives in exactly one place and is pointed to from everywhere else. Every product we make does something that others cannot easily do.

WHY. A fact recorded twice will eventually be recorded differently, and then nobody knows which is true. A product that others can make is a product others will make, cheaper. Uniqueness in records keeps us honest; uniqueness in products keeps us alive.

EXAMPLE. The port a service uses is written in the port registry and nowhere else; the code reads the registry. An Odia clinic-intake model is a product because no laboratory in another country will train one.

ANTI-PATTERN. A README that repeats the plan file, a plan file that repeats the progress log, and a to-do app that competes with ten thousand to-do apps.

7.4 Consensus

STATEMENT. No single instrument is trusted alone. When a finding matters, it comes from a council of different-family models or different people, reconciled by an arbiter. What they agree on is reliable. What only one asserts is flagged.

WHY. A single model hallucinates in ways it cannot detect. Different models make uncorrelated errors, so agreement between them filters the hallucination. The same is true of people. One brain still adjudicates; the council is how its instruments earn trust.

EXAMPLE. A security review is run by three models of different families; the arbiter accepts the findings all three make, and lists the findings only one made as suspects to be verified by a person.

ANTI-PATTERN. Pasting a single model's answer into a customer deliverable because it sounded confident.

7.5 Quality over quantity

STATEMENT. One solution that a customer uses beats ten that nobody does. One video that a patron shares beats a hundred that are scrolled past. We measure what is used, not what is made.

WHY. When production is cheap, the temptation is to produce. The channel, the portfolio and the product line all suffer the same way when the temptation wins: they fill with things that are technically complete and practically dead, and the dead things hide the living ones.

EXAMPLE. A pair spends a week making one lane piece with a real benchmark number and a downloadable handout rather than five pieces that restate a press release.

ANTI-PATTERN. A leaderboard of commits, videos published, or apps deployed, with no column for users.

7.6 Scale over stale

STATEMENT. When choosing between something that could grow and something that is finished, we choose the thing that could grow. A process that keeps expressing new capability is worth more than a product that ships once and decays.

WHY. The field moves monthly. A finished thing is a thing that has stopped learning, and in this field that is a thing that has started dying. We sell the process, not the product, because the process keeps the product current.

EXAMPLE. The Loop is filmed every day, so the curriculum is re-recorded every cohort and never falls behind the tools it teaches.

ANTI-PATTERN. A curriculum written once in a document, taught from that document three years later.

7.7 Utility over design

STATEMENT. A thing must work before it is made pretty, and if a design choice reduces what the thing can do, the design loses.

WHY. Design is easy to admire and easy to fake, and it is the first thing a beginner reaches for when the hard problem is not yet solved. Utility is what the customer pays for. Design that serves utility is welcome; design that replaces it is a costume.

EXAMPLE. An instrument's front panel is laid out by the order in which the operator actually turns the knobs, not by symmetry.

ANTI-PATTERN. A dashboard with animated charts whose numbers are fabricated placeholders because the data pipeline was not finished.

7.8 Aesthetics over modern

STATEMENT. We choose what is beautiful and durable over what is currently fashionable. Modern is a date. Aesthetic is a judgment that survives the date.

WHY. Fashion in interfaces, in hardware finishes and in typography changes every eighteen months, and a product that follows it looks old on the same schedule. The mixer, the oscilloscope and the good hand tool have not changed in decades because they were designed to be used, held and understood. Our instruments belong to that lineage.

EXAMPLE. A physical knob with detents and a printed scale, rather than a touch surface that mimics one; a page set in a book face, rather than in this year's geometric sans.

ANTI-PATTERN. Re-skinning a working product every quarter to match whatever the large platforms shipped last.

7.9 Sustainability over strength

STATEMENT. We build what the organism can sustain: in people, in capital, in materials, in energy. A pace, a cost or a design that wins this month and exhausts us next month is rejected.

WHY. The four standards by which we judge an organisation are time, uniform output, scalability and sustainability, bound by an ethical ring: none of the four is ever bought at the cost of trust. Strength without sustainability is a sprint that ends in a collapse, and a collapse ends the story in public.

EXAMPLE. Wednesday stops at half past five, Sunday is off, and the physician can send anyone home. A device draws its power from a cell that can be replaced, not one that is glued in.

ANTI-PATTERN. A heroic all-night push before a demo, celebrated on Friday, paid for with a week of nothing.

7.10 Metal over plastic

STATEMENT. Where an instrument can be made in metal, wood, glass or another material that ages well and can be repaired, it is. Plastic is used where it is the right material, never because it is the cheap one.

WHY. An instrument is held. Weight, temperature and finish are part of how it is trusted, and a thing that feels disposable is treated as disposable. Metal can be machined, drilled, re-anodised and recycled. This rule is also the physical form of the aesthetics rule and the sustainability rule.

EXAMPLE. A folded aluminium enclosure with a printed insert, rather than a fully printed shell; a steel knob on a metal shaft.

ANTI-PATTERN. A glossy injection-moulded box chosen because the render looked like a consumer product.

7.11 DIY over assembled

STATEMENT. We make what we can make. Where a part can be designed, printed, etched, wound or soldered on our bench, it is, and the making is filmed. We buy assembled only what we could not make well.

WHY. Making is how an engineer learns what a part costs, what it can do and how it fails. It is also the content: a thing made on camera is a lesson, a thing unboxed is an advertisement. And a made part can be changed tomorrow; an assembled part can only be replaced.

EXAMPLE. The enclosure is modelled and printed on the bench; the board is laid out here and ordered from a fabricator; the firmware is written here. The microcontroller is bought.

ANTI-PATTERN. A product that is a bought development board in a bought case with a bought display, running a bought model, sold with our name on it.

7.12 Open source over closed

STATEMENT. Our work is public by default. Code, documentation, process, curriculum and the live dashboard are open, under a permissive licence, so that anyone can learn from them and so that our claims can be checked. The exceptions are listed, and only those.

WHY. Openness is how a small organisation earns the trust that a large one buys with a brand. It is also how the family grows: a contributor who reads our code is a candidate, a patron who reads our process is a customer. And it is the reason the channel can show everything, because there is nothing to hide.

EXAMPLE. The Academy's repositories are public under the Apache 2.0 licence; the members area sells access and blueprints, not secrets.

EXCEPTIONS. Customer and patient data; a customer's own deliverables, which are theirs; keys, secrets and credentials; an individual's radar scores; health records; and anything a person has opted out of, piece by piece. Section 12 states each.

ANTI-PATTERN. A private repository "until it is ready", which is never.

7.13 Velocity

STATEMENT. We ship every day. What is not documented did not happen. No claim is made without a verified demonstration. Working beats described.

WHY. These three sentences are the operating form of every other rule. Daily shipping keeps the loop short. Documentation is how one source per fact is maintained. The verified demonstration is consensus applied to our own claims. Together they are why a small team can move faster than a large one without losing its footing.

EXAMPLE. At half past six in the evening every engineer has committed, recorded or written something that shows the day's work; the radar scores it before the Close.

ANTI-PATTERN. A status meeting in which progress is described in the future tense.

7.14 The four standards, bound by ethics

We measure an organisation, including ourselves, on four standards rather than on headcount. *Time*: cycle time and time to value per outcome. *Uniform output*: consistency and near-zero variance between one delivery and the next. *Scalability*: the marginal cost of the next unit of output. *Sustainability*: the output the organism can keep producing without exhausting its people or its capital. Around all four sits the ethical ring: none of them is ever bought at the cost of trust. A faster loop that cuts a corner on consent, a more uniform output that hides a failure, a cheaper unit that offloads risk onto a customer, a sustainable pace bought by underpaying someone: each is a violation, and the ring outranks the standard.

WHAT THIS MEANS ON MONDAY

- Before you replace anything, ask which constraint you are under. Space: add beside it. Time: swap it and record the swap.
- Before you record a fact, find where it already lives. Point to it.
- Before you trust a model's finding, get a second family's opinion.
- Before you make anything pretty, make it work; before you buy anything, ask whether you could make it on the bench.
- Before the day ends, ship something and write it down.

8 Ethics

The ethics of the Academy are short because they are absolute. They apply to engineers, mentors, contributors and partners alike, and to the things we build as much as to the way we behave.

8.1 Honest results

We never fabricate a result, a benchmark, a test outcome, a user number or a customer quote. A number that appears in a video, a handout, a betadoc or a report was measured, and the measurement can be reproduced from the artifacts we publish. When a benchmark is unfavourable to us, it is published with the same prominence as one that is favourable. When a demonstration is staged for the camera, the staging is disclosed on screen.

8.2 Attribution

We credit the people, papers, repositories and models we build on, by name, in the artifact itself. Work generated with AI assistance is disclosed as such where a reader would reasonably want to know, and the human who verified it is named as responsible for it. We do not present a reproduction as an invention.

8.3 Consent

No person appears on camera, in a transcript, in a dataset or in a case study without informed written consent, and consent is specific: it says what is recorded, where it will be published, and how it can be withdrawn. A customer's employees, a clinic's

patients and a farmer's family are not "the customer" and their consent is separate. Consent obtained under pressure is not consent.

8.4 Data minimisation and the PII rule

Personal data is treated as radioactive by default. We collect the minimum a solution needs, keep it for the minimum time, and prove that personally identifiable information is redacted before any external call is made. Client data is never used to train a model without written consent for that purpose. Where a solution can run on a device the customer owns, it does, and the data never leaves.

8.5 Hardware in people's hands

An instrument we ship can burn, shock, or fail in a way that harms. Every device that leaves the bench has been tested for electrical safety, thermal behaviour and mechanical failure, and the test is recorded. Lithium cells are protected. Mains voltage is never exposed. A device intended for a child meets the applicable standards before it is sold, not after.

8.6 What we will not build

We do not build systems whose purpose is to deceive people, to surveil them without their knowledge, to discriminate against them, to harm them, or to evade a law that protects them. We do not build a thing for a customer that we would refuse to publish. When an engineer is asked to build such a thing, they refuse and report it, and the refusal is protected.

WHAT THIS MEANS ON MONDAY

- Every number you publish has a measurement behind it that someone else could run.
- You ask before you record, and you write down what was agreed.
- You redact before you send, and you can prove it.
- You would rather lose the customer than build the thing you would not publish.

9 Code of conduct

This code applies to everyone in every circle of the family, in the building, on the bench, on the channel, in the repositories, in chat, and at any event where the Academy is represented. It is enforced by the People and HR lead and the council, and acknowledging it is a condition of joining.

9.1 Respect

We treat every person as capable of learning, as deserving of a straight answer, and as entitled to their dignity. We criticise work, not people. We ask before we assume. We listen to the quietest person in the room before the loudest, because the quietest is usually the one with the observation nobody else made.

9.2 No discrimination

The Academy does not discriminate, in selection, assignment, assessment, reward, growth or treatment, on the basis of gender, gender identity, sexual orientation, caste, religion, language, region, ethnicity, disability, age, marital status, family responsibility, economic background or the college a person came from. This is a rule, not an aspiration, and a breach of it is a breach of the docket.

9.3 Equal opportunity

Every engineer in a cohort has the same access to mentors, bench time, tools, customers, camera time and the radar. Assignment to a vertical, to a customer or to a lane is made from the radar's evidence and the engineer's stated interest, and the reasoning is written down. Where two people are equally placed, the tie is broken by a stated rule, never by a preference. Reward and growth are performance-based, as Section 25 states, and performance is measured by evidence that every engineer can see for themselves.

9.4 Harassment

Harassment is any unwelcome conduct, verbal, physical, visual or online, that demeans, intimidates or threatens a person, or that makes their participation in the Academy conditional on tolerating it. It includes sexual harassment as defined by the law of India, and it includes the subtler forms: exclusion from information, repeated interruption, mockery of accent or background, and the assignment of menial work along the lines listed in the non-discrimination rule. Harassment is grounds for removal from the family.

9.5 The reporting path

A person who experiences or witnesses a breach of this code may report it to the People and HR lead or to any member of the core team, in person, in writing or through the confidential channel named at induction. A report is acknowledged within one working day and investigated by two members of the council who are not the subject of it. The person who reported is protected from retaliation absolutely; retaliation is itself a breach and is treated as the more serious one. The outcome is communicated to the reporter. Where the law requires an internal committee, the Academy constitutes one and this path feeds it.

9.6 Communication norms

We write in the open by default, in threads that others can search. We disagree in public and decide in public, and once a decision is made we carry it out as if it were our own. We do not send a message after the Wednesday stop or on a day off that expects a reply before the next working day. We say "I do not know" and "I was wrong" without ceremony, because the alternative is a culture in which nobody learns.

9.7 Conflict resolution

Disagreement about work is resolved on the evidence, by the two people involved, within the day if possible. Disagreement that persists goes to the mentor of the relevant stage. Disagreement about a person goes to the People and HR lead through the reporting path. Disagreement about this docket goes to the council through the amendment process. Nobody is ever asked to resolve a conflict with someone who holds power over their reward.

9.8 Consequences

A first breach of a conduct rule, other than harassment or discrimination, is met with a conversation and a written note. A second is met with a warning recorded on the radar. A third, or any breach of the harassment or discrimination rules, is grounds for removal from the cohort and the family. Removal is decided by the council with the People and HR lead, and the person is heard before the decision.

WHAT THIS MEANS ON MONDAY

- You will be assigned, scored and rewarded by evidence you can see, by rules that are written down.
- If something is wrong, you tell the HR lead or any mentor, and nothing bad happens to you for telling.
- You criticise the work and never the person, in the open, and you carry out decisions you argued against.

10 The Internal Committee for the prevention of sexual harassment

Indian law, under the Sexual Harassment of Women at Workplace (Prevention, Prohibition and Redressal) Act, 2013, requires an employer with ten or more people to constitute an Internal Committee. The Academy constitutes one for every location where it works, including a hosted cohort, and this section states how it is reached and how it acts. The code of conduct's reporting path feeds it; it does not replace it.

10.1 Composition

The committee is chaired by a senior woman member of the core team, includes at least two further members of the family committed to the cause of women or with legal or social-work knowledge, and includes one external member from a non-governmental organisation or a person familiar with the issues of sexual harassment. At least half the members are women. The names and contact details of the members are displayed by the bench and on the members' page of the Academy site, and are entered in each cohort's edition of this docket before printing.

10.2 Making a complaint

A complaint is made in writing to any member of the committee within three months of the incident, or of the last incident in a series; the committee may extend this period for reasons it

records. A person who cannot write is helped to. The committee may, at the request of the aggrieved person, attempt conciliation before inquiry, but never a monetary settlement as the basis of conciliation. The inquiry is completed within ninety days, both sides are heard, and a report is given to the employer within ten days of completion. The employer acts on the report within sixty days.

10.3 Protection and confidentiality

The identity of the complainant, the respondent, the witnesses, and the contents of the complaint and the inquiry are confidential, and publishing them is itself a breach. During the inquiry the committee may recommend that the complainant or the respondent be transferred, given leave, or otherwise relieved so that they need not work together. Retaliation against a complainant or a witness is treated as the more serious breach, as Section 9 states. A false complaint made with malicious intent is also an offence, but a complaint that is not proved is not thereby malicious.

WHAT THIS MEANS ON MONDAY

- The committee's members and their contacts are on the wall by the bench. Any of them can be approached, in writing, in confidence.
- A complaint is heard within ninety days, by people who are not the subject of it, with both sides heard.
- Nobody who complains or gives evidence suffers for it.

11 Whistleblowing and anti-corruption

11.1 Reporting wrongdoing

Any member of the family who reasonably believes that a law, this docket, or a customer's trust is being broken, whether by an engineer, a mentor, a partner or the Academy itself, may report it to the People and HR lead, to any member of the council, or, where those are implicated, to the external member of the Internal Committee. A report may be made anonymously. The person reporting is protected from any adverse consequence, and a report made in good faith that proves unfounded is not held against them. The council records every report and its outcome in the memory document, with identities removed.

11.2 Gifts, hospitality and conflicts

We do not give or accept anything of value to obtain or keep business. A gift or hospitality above a modest value, set by the council and published, is declined or declared to the People and HR lead, who keeps a register. Meals shared with a customer during a field deployment are normal and are recorded as ex-

penses. A gift from a supplier that might influence a purchasing decision is always declined. Conflicts of interest are declared under Section 12 before work begins.

11.3 Bribes and facilitation payments

The Academy makes no facilitation payments, to any official or intermediary, for any permit, licence, clearance, connection or approval, however small and however customary. An engineer asked for one refuses, records the request, and reports it the same day. The Academy will lose the permit rather than pay. Where a payment is demanded under threat to a person's safety, the person pays and reports immediately, and the Academy treats it as extortion, not bribery.

11.4 Books and records

Every payment the Academy makes or receives is recorded accurately, with what it was for, and every expense an engineer claims has a receipt. No account is kept off the books, and no description is written to disguise a payment's purpose.

WHAT THIS MEANS ON MONDAY

- If something is wrong, you can say so, anonymously if you wish, and nothing happens to you for saying it.
- You do not pay anyone to get anything done, and you do not accept anything that might change a decision.
- Every rupee has a receipt and an honest description.

12 Integrity, confidentiality and intellectual property

12.1 Non-disclosure

Every person in the engineer, core-team and partner circles signs the non-disclosure acknowledgment in Appendix E. It covers customer and patient data, a customer's unpublished deliverables and business information, credentials and keys, unpublished product plans that the council has marked confidential, and the personal information of other members of the family. It does not cover anything the Academy publishes, which is almost everything, and it does not cover a person's own skills, which they take with them. The obligation survives the engagement by two years.

12.2 Public by default, and the exceptions

The Academy publishes its code, its documentation, its process, its curriculum, its schedule, its live dashboard, its recorded sessions and its builds. Five things are never public.

- **Customer and patient data.** Names, records, footage and any derived dataset, without written consent for that specific use.
- **Individual radar scores.** A person's eight-axis profile is visible to that person and to the core team only. Team totals and shipped work are public.
- **Health records.** Check-in notes stay with the physician and physiotherapist. Only "cleared" or "rest day" reaches the schedule.
- **Keys, secrets and credentials.** Stored in the designated keys file, never in a repository, a chat or a recording.
- **Per-piece opt-outs.** Any person may opt out of any single recording or publication by saying so before it is cut, and the opt-out is honoured without question.

12.3 Intellectual property

Work produced for the Academy's own products, curriculum and channel is owned by the Academy and published under the Apache 2.0 licence, with the author credited in the artifact. Work produced for a customer under a customer agreement is the customer's exclusive property, including the outputs derived from the customer's information, and the Academy retains only the right to describe the engagement in general terms with the customer's consent. A model trained on a customer's data belongs to the customer. Contributions from the contributor circle are accepted under the same licence, and a contributor keeps their copyright.

12.4 Conflicts of interest and outside work

A member of the family declares any interest in a customer, a supplier, a competitor or a partner before working on anything that touches it. Outside work is permitted if it is declared, does not use the Academy's customers, data or confidential information, and does not compete with a product the Academy is building. When in doubt, declare it; the People and HR lead keeps the register.

12.5 Integrity

We do what we said we would do, and when we cannot, we say so before the deadline rather than after it. We do not represent another person's work as our own. We do not use the Academy's name, channel or customers for personal gain without the council's agreement. We keep the promises in this docket to each other even when nobody is watching, which is the only meaning of the word.

WHAT THIS MEANS ON MONDAY

- Everything you make for the Academy is public and licensed. Everything you make for a customer is theirs.
- Five things stay private, and you know the list.
- Keys go in the keys file. Never in a commit, never on screen.
- If you have a side interest, you write it down before you touch the work.

13 Health, safety and wellbeing

The Academy's day is long and its bench is dangerous, and we have a physician and a physiotherapist on the core team precisely because most engineering programmes do not. The health rules are enforced by them, not by an engineer's willpower, and they outrank every deadline.

13.1 Hours and rest

The Loop runs from nine in the morning to eight in the evening, a ten-hour working day plus lunch away from the desk, Monday to Saturday during the internship. Attendance is recorded by the biometric at the start and the end of the day, as Section 26 states. Wednesday stops at half past five for everyone, without exception, and nothing is scheduled after it. Sunday is fully off: no chat, no commits, no calls; the music club on Sunday morning is voluntary and is not work. A mentor who schedules work into the rest day has breached this docket. Once permanent, the minimum is nine hours per working day.

13.2 The weekly check-in

Once a week the Voice hour becomes a check-in with the physician and the physiotherapist. It is mandatory, it is private, and it is the place where fatigue, pain, sleep, mood and anything else are discussed. The physician may declare a rest day for any engineer, and the rest day is honoured without explanation to anyone else. Only "cleared" or "rest day" reaches the schedule.

13.3 Bench and laboratory safety

Soldering is done with extraction and eye protection. Mains voltage is never worked on live and never exposed on a bench where others sit. Lithium cells are stored in a fire-safe contain-

er, charged under observation, and never punctured, shorted or left connected overnight. The 3D printer runs with ventilation and is not left unattended for long prints. Static-sensitive parts are handled on an earthed mat. Every injury, however small, and every near miss is recorded the same day. The bench and silicon lead can stop any activity on the bench at any time, and the checklist in Appendix G is signed by every engineer before the first bench session.

13.4 Mental health

A twelve-hour day of learning and shipping, in public, with a radar that scores you every week, is a load, and it is normal to find it heavy. Saying so is not weakness and is never scored. The physician is the first person to speak to; the communication coach and the People and HR lead are also available; and a referral to an external counsellor is arranged by the physician on request, at the Academy's cost, in confidence.

13.5 Escalation

A health or safety concern about oneself or another person is raised the same day to the physician, the physiotherapist or the bench lead. A concern that the rules are being bent, for instance a pattern of late-night messages, is raised to the People and HR lead through the reporting path in Section 9. An emergency is handled by the emergency services first and the Academy second; the numbers are on the wall by the bench.

WHAT THIS MEANS ON MONDAY

- You stop at half past five on Wednesday and you do not work on Sunday. Nobody will ask you to.
- You see the physician and physiotherapist once a week. What you say there stays there.
- You sign the bench checklist before you touch an iron, and you report every near miss.
- If the load is heavy, you say so, and it costs you nothing on the radar.

14 AI usage policy

Every engineer works with AI beside them all day, and the Academy's own machine is built of models. This section states how the tools are used, so that speed never costs a customer their data or the Academy its honesty.

14.1 What may be sent where

Models are classed by where they run and who operates them. A local model on the Academy's or the customer's machine may see anything the engineer may see. A model operated by a provider under the Academy's paid seat, with contractual no-training terms, may see code, documentation and synthetic or public data, and may see customer data only after the redaction gate has removed personal information and the customer's agreement permits external processing. A free or consumer model, or any model without such terms, sees nothing that belongs to a customer and nothing marked confidential. Keys and secrets are never sent to any model. When in doubt, the local council of models is used, or the forward-deployment lead is asked.

14.2 The redaction gate

Every external call from a solution passes a gate that detects and redacts personally identifiable information, and the gate's log is an audit receipt. The gate is not optional, it is not disabled for a demonstration, and a solution without it does not pass the Governed gate. Engineers are taught to treat personal data as radioactive: it is handled with the shortest exposure, by the fewest people, and it leaves no trace where it is not needed.

14.3 Prompt and context hygiene

A prompt is code. It is versioned, reviewed and tested like code, and a prompt library is an artifact of the curriculum. Context given to a model is the minimum it needs for the task, never a

whole repository or a whole database because it was easier. Agents are given typed tools rather than free rein, so that they act rather than guess, and every state-changing action an agent takes is logged as a receipt.

14.4 Verification and responsibility

A model's output is never a source of record. Every artifact a model produces that reaches a customer, a repository, the channel or a decision has a named human who verified it, and where the finding matters, a council of models of different families has agreed on it. An engineer who ships an unverified model output is responsible for it exactly as if they had written it, because they did.

14.5 Disclosure

Work produced with AI assistance is disclosed as such wherever a reader would reasonably want to know: in a commit that is largely generated, in a piece on the channel, in a document given to a customer. Disclosure is a line, not an apology. The Academy's position is that AI-assisted work verified by a competent engineer is simply engineering, and that hiding the assistance would be the dishonest act.

14.6 The seat

Each engineer's AI seat is provided by the Academy under Section 22, is used for Academy and cohort work, and is tied to the engineer's Academy email. It is not shared, its usage is visible to the engineer and the training lead, and it is returned on leaving.

WHAT THIS MEANS ON MONDAY

- You know which class a model is in before you paste anything into it. Customer data goes only through the gate.
- Your prompts are in the repository, reviewed like code.
- If a model wrote it and you shipped it, you own it. Say that it helped.

15 Security and devices

15.1 Identity

Every engineer is issued an Academy email address at `whitenoiseacademy.com`, and uses it, and no other, for every work-related and social account, subscription and service used in the course of the engagement: the AI seat, the source-code host, the cloud console, the channel tools, the members area, and any subscription the Academy pays for. Two-factor sign-in is enabled on every account that offers it, a password manager holds every credential, and no password is reused. Access cards and fingerprint identities are issued at induction; the card opens the building and the lockers, and the biometric records attendance as Section 26 describes.

15.2 Devices

The Linux workstation is the Academy's and is encrypted at rest with a screen lock of at most five minutes. Personal laptops may be used for reading and for the channel, never for customer data. Personal phones never hold customer data, customer contacts or customer conversations. The work phone, issued under Section 22, is the only device used for customer interaction; it stays in the engineer's locker outside working hours and does not leave the building. A lost or stolen device is reported within the hour to the People and HR lead, who revokes its sessions.

15.3 Network and secrets

Solutions and machines join the private mesh with an identity of their own; nothing is exposed to the public internet except through the demonstration gateway, time-boxed. Secrets live in the designated keys file and in the runtime secret store, never in a repository, a chat, a screenshot or a recording; a secret that has been seen on screen is rotated the same day. Public wireless networks are used only through the mesh.

15.4 Phishing and social engineering

Nobody at the Academy will ever ask for a password, a one-time code or a key by message or by phone. A request that seems to come from a mentor, a customer or the council and asks for credentials, a payment or an urgent exception is reported, not answered. The most convincing message is the one to check.

15.5 Incidents

A suspected breach, a leaked key, a device lost, a customer's data exposed, or an agent that did something it should not, is reported the same hour to the forward-deployment lead and the People and HR lead. The first step is containment, the second is the customer told the truth, the third is the record written, and the fourth is the fix. Nobody is blamed for reporting; people are blamed for hiding.

WHAT THIS MEANS ON MONDAY

- Your Academy email is your identity for everything. Two-factor everywhere, a password manager for all of it.
- Customer conversations happen on the work phone, which sleeps in your locker.
- A secret on screen is rotated today. A lost device is reported this hour.

PART III · HOW WE WORK

16 The Solutions Development Lifecycle

We do not run a software development lifecycle, because we do not ship software alone. We run a Solutions Development Lifecycle: eight stages, cyclic, with AI in the middle of every one and hardware at the end of every loop. A solution is carried

through all eight by the engineer who owns it. The stages are also the eight verticals that graduates come to lead, and the eight axes on which the radar scores.

Stage	The work	Artifact produced	Exit criterion
1 Discover	Find the customer and the problem. Reading a use case, market and gap, niche discovery, where AI helps.	A one-page brief with a named person, their problem, and why they care	The person has said, on record, that the problem is real
2 Design	Spec, braindoc, scope, PRD, schema and API contract, industrial design of the instrument	Executable spec; enclosure and panel sketch; agentic plan	A stranger can read the spec and know what "done" is
3 Build · software	Application, backend, agentic pipeline, tool server, the small model	Running code in the repository with tests	Runs from a clean clone by someone who did not write it
4 Build · hardware	Firmware, board layout, enclosure print, multi-bus comms, the legacy bridge	A device that powers on and talks to the software	Powers on, passes the bench safety checks, logs to the software
5 Verify	Tests across dimensions, consensus review, field test with the customer	Test results, consensus verdicts, audit receipts	No claim without a verified demonstration; the customer has used it
6 Ship	Deploy, domain, observability, on-premises or cloud twin, secrets injected at runtime	A live URL and a live device; the phasedoc cockpit green	Reachable by the customer without the engineer present
7 Tell	Video, blog, documentation, the betadoc; the handout	Published piece with a number and a handout	Published, with a contact path, on the channel
8 Sell and support	Patrons, pre-orders, custom orders, support automation, feedback	An order, a payment, or a written "no" with the reason	Feedback recorded and fed to stage 1 of the next loop

Table 3. The eight stages, their artifacts and exit criteria. Stage 8 feeds stage 1.

16.1 The loop within the loop

The eight stages map onto the forward-deployed engineering operating loop we inherit from the dKube practice: understand, formulate, optimise, ship. Stages 1 and 2 are understanding and formulating. Stages 3 to 5 are optimising, which in our vocabulary includes the whole build, because a build that is not optimised for cost, sensitivity, security and the customer's real environment is not a build. Stages 6 to 8 are shipping and growing. Four gates sit on the boundaries, each signed by a mentor of the stage: *Scoped* after stage 1, *Designed* after stage 2, *Governed* after stage 5, *Manifested* after stage 8. The rule at every gate is the same: code that runs, not slides that describe it.

16.2 AI in the middle

At every stage the engineer works with AI beside them: to read a market, to draft a spec, to scaffold the boilerplate, to generate the tests, to review the code from three model families at once,

to write the first draft of the piece. The engineer owns the core: the state machine, the schema, the panel layout, the claim. AI scaffolds; the engineer decides and verifies. Every AI-produced artifact that reaches a customer has a named human who verified it.

16.3 Hardware at the end

Every loop ends in something physical, however small. For a small-model solution that may be the device it runs on. For a workflow solution it may be a single printed panel with one button that triggers it. The point is not the size of the hardware. The point is that a solution that can be held has been through stages 4 and 5 for real, and a solution that cannot be held has skipped them.

17 The Loop and the curriculum

Every day follows one unbroken cycle. A concept in the morning, its physical application before lunch, the code that consumes it in the afternoon, and an articulation of the whole before the day ends. The order matters: because the broadcast re-

quires you to explain what you built, the concept is locked into memory before you leave the room. The Loop is printed on one page in Appendix A and lives at the schedule page of the Academy site.

Time	Block	What happens	Who
09:00	Open	Stand-up and radar: what shipped yesterday, the one artifact you ship today, who is blocked	Everyone; a rotating host
09:15	First Principles	Forty-five minutes of mathematics, digital design, electronics or system architecture, taught from the ground up as a six-beat lesson	Training lead; bench mentors; common to all
10:00	The Bench	Immediate physical application: multimeter, oscilloscope, schematics, breadboarding, CAD, soldering, printing, board layout	Everyone; bench lead; filmed
12:30	Lunch	Away from the desk	
13:30	Voice	Communication workshop: speaking, writing, pitching, listening. Weekly, the health check-in	Communication coach; physician and physiotherapist weekly
14:30	Vertical Hour	One hour deep in one lifecycle stage, as a six-beat lesson with an artifact	Stage mentor
15:30	Forward Deployment	Your own solution, end to end, for a named customer. AI scaffolds; you own the core; mentors on call	Each engineer; screen and bench recorded
18:30	The Broadcast	Ship the artifact: a commit with documentation, a ninety-second clip, a schematic, or an audio note on the day's failure. Footage to the content team	Each engineer; content lead
19:30	Close	Score the day on the radar, write tomorrow's one line, leave	Everyone

Table 4. The Loop: a ten-hour working day plus lunch. Monday to Saturday; Wednesday closes at 17:30; Sunday is off.

17.1 The six-beat lesson

Every taught topic, in First Principles and in the Vertical Hour, follows the same six beats, borrowed from the forward-deployed engineering curriculum: *Motto*, the one sentence to remember; *Problem*, the real situation the topic solves; *Concept*, the idea from first principles; *Build it*, the artifact made in the session; *Use it*, the artifact applied to something real; *Ship it*, the artifact committed or recorded. A lesson runs forty to forty-five minutes and produces one concrete thing: a checklist, a brief, a model, a matrix, a schematic, a specification, a repository, a prompt library or a skill. A lesson that produces nothing was a talk, and we do not give talks.

17.2 The week

Monday's Open is cycle planning: every engineer names this cycle's customer and artifact, and the health check-in replaces Voice. Tuesday is the standard Loop. Wednesday is the standard Loop until the hard stop at half past five; the broadcast is a written note only. Thursday is the standard Loop, and the content team publishes the week's long-form pieces from the footage so far. Friday afternoon is Demo and Radar Review: every engineer demonstrates live, mentors score all eight stages, and the radar is updated for the week; at five the Live Build show goes on air, a caller's application built and delivered in thirty minutes, with engineers rotating as crew. Saturday is a standard Loop day, the sixth of the internship week. Sunday is off, fully, and the music rooms are open from ten until one for anyone who wants them.

17.3 The sixteen weeks

A cohort runs sixteen weeks in four phases. *Bootcamp*, weeks one and two: the toolchain, the pipeline, the bench, the rules; project zero is the radar tracker itself, built by the engineers who will be measured on it; every engineer ships one tiny solution end to end and finds a customer. *Sampling*, weeks three to eight: the Vertical Hour rotates through the eight stages one week at a time, so that everyone has touched all eight with real work; two small solutions per engineer, each with a named customer in the college or the town; the radar profile forms from evidence; the first patrons follow live. *Lock-in*, weeks nine to twelve: the vertical is chosen with the radar; solutions move onto the two product lines; prototypes go into customers' hands; custom design workshops open. *Ship*, weeks thirteen to sixteen: the pre-order batch, the betadocs, the public launch, demo day; confirmation, and vertical leads named. The week-by-week curriculum across the four tracks is in Appendix B.

17.4 The four tracks

The curriculum runs four tracks in parallel, one per block of the day. *First Principles* covers the mathematics of signals and probability, digital design from gates to buses, analogue and digital electronics, and system architecture from a single process to a mesh. *The Bench* covers measurement, breadboarding, schematic capture, board layout, enclosure design, printing and assembly. *Code and models* follows the forward-deployed engineering lesson spine: version control, models and prompting, local versus cloud with the PII gate, skills and pipelines, schema and contract design, agentic planning, tool servers, context-engineered pipelines, task-specific model selection and small tuning, server-rendered services, mixture of cloud, cost

routing, privacy and residency, threat modelling, mesh and access control, observability, verification, consensus, testing across dimensions, audit receipts, deployment, marketing, community and support automation; on our bench it adds firmware,

edge runtimes and on-device inference. *Voice* covers speaking, writing, the pitch, the interview, the demonstration and listening.

WHAT THIS MEANS ON MONDAY

- You are at the Open at nine with yesterday's artifact and today's one line.
- Every lesson you attend ends with something you made. If it did not, say so at the Close.
- Your afternoon belongs to your solution and your customer, and a mentor is one call away.
- At half past six you ship, at half past seven you score, at eight you leave.

18 The creative side

The Academy began as a school of music, arts and film, and it keeps that inheritance deliberately. An engineer who can only engineer cannot tell the story of what they built, cannot cut the film that sells it, and cannot rest in a way that restores them. The creative skills below are part of the programme, not an extra.

18.1 Scripting and storytelling

Every piece on the channel begins as a script, and every script begins with the same question the communication coach asks in the Voice hour: what does the viewer know at the end that they did not know at the start? Engineers learn to write a hook, a build, a result and a close; to structure a ninety-second short and a twenty-minute long-form; to narrate a failure so that it teaches; and to write the one-page handout that turns a viewer into a member. The scripts are artifacts, committed alongside the code they describe.

18.2 Video editing and filmmaking

The content team produces the long-form pieces, but every engineer learns to shoot and cut. Framing a bench shot, recording clean audio, screen capture that a viewer can read, a cut that keeps the pace, colour that matches between the camera and the screen, and the narrated demonstration film that every betadoc carries. By the end of the cohort each engineer has cut their own

short pieces for weeks and has crewed the live build show. Filmmaking is taught the way the Academy has always taught it: on real projects, for real audiences, with the film shown.

18.3 Illustration, sound and design

The morning lesson becomes a diagram; the diagram becomes the members' handout. Engineers learn to draw a system so that a stranger understands it, to design a panel and a scale, to choose a typeface for a reason, and to make a sound for a device that tells the operator what happened without a screen. These are the same skills the Root Skills programme teaches its younger learners as creative visionaries and digital storytellers, taught here at working depth.

18.4 The music club

Every Sunday morning from ten until one the Academy's music rooms are open to every member of the family, free of charge. The club is voluntary, it is not work, and no work is discussed there. Anyone may learn an instrument from the beginning, play with others, or follow the graded Rockschoool progression that the Academy has offered its music students for years, with grading available to any engineer who wants it. The club exists for mental peace and balance: after a week of building, an hour of playing is one of the ways we rest, and it costs nothing on the radar to come or to stay away. Sunday remains a day off; the club is one of the things a day off is for.

WHAT THIS MEANS ON MONDAY

- You will write, shoot and cut your own pieces, and they will be shown.
- Your diagrams are handouts and your panels are designs. Draw them as if they will be printed, because they will.
- Sunday morning at ten the music rooms are open. Come if it restores you.

19 Forward deployment

19.1 The genome method

Every cell in a body carries the same genetic material; what differs is which genes are expressed. We take the same view of an engineer. An engineer is not a label. An engineer is a cell that carries one engineering genome and expresses whatever faculty the problem in front of them demands: front end today, firmware tomorrow, security reviewer on Friday, agent orchestrator next week. We therefore do not certify "a front-end person" or "a data person". We grow people who can differentiate quickly, and we measure the latency of that differentiation rather than the depth in any one layer.

Three practices follow. *Learning how to learn* is the central gene: to decompose an unfamiliar intent into checkable claims, to delegate the mechanical work to agents, to verify adversarially, and to internalise the pattern so that the next differentiation is faster. If we taught a fixed stack, the programme would expire with the stack. *Express while you update*: a cell does not stop functioning to grow, and neither do we; the deliverable ships while the domain model is refined in the same loop, and learning is harvested from output rather than scheduled instead of it. *Altitude control*: beyond the horizontal axis of scope and the vertical axis of the lifecycle, a forward-deployed engineer moves deliberately along a third axis, from the architecture diagram to a single failing log line and back, without changing tools.

19.2 Paradigm fluency

Programming paradigms are genes to express, not ideologies to defend. Agentic when the work exceeds one person's hand. Parallel when sub-tasks are independent and speed matters.

Functional when correctness and testability dominate. Sequential when a clear chain is clearer than an abstraction. Imperative when control over hardware or performance is the point. In the Vertical Hour, an engineer is regularly asked to solve the same problem twice in two paradigms and to defend the switch.

19.3 The named-customer rule

No solution is designed until it has a customer with a name, a problem and a reason to care, and that customer has said so on record. "Innovative solution" is not a customer. "Small businesses" is not a customer. The owner of the pharmacy on the main road, who loses an hour a day to a stock ledger, is a customer. In Bootcamp every engineer goes into the college and the town and comes back with one. On the Friday of week two, every engineer pitches; the council chooses the first two solutions to carry onto the product lines, one from each line, and the rest become sampling projects.

19.4 Sitting with the customer

Forward deployment means the engineer goes to where the problem is. They sit in the clinic, stand in the field, watch the ledger being written. They install the first version themselves, watch it being used, and fix what they see in the same visit. The customer's word at each gate is evidence on the radar. A solution the engineer has never watched being used has not been verified, whatever the tests say.

WHAT THIS MEANS ON MONDAY

- You will be asked to do things you have not done before, on purpose, and scored on how fast you become competent, not on whether you already were.
- You do not open a design tool until a named person has told you their problem.
- You will go to the customer. The customer will not come to you.

20 The Radar

The radar is how work is measured, how verticals are assigned, and how autonomy is earned. It is built from evidence, not opinion, and every engineer can see their own profile at any time.

20.1 The eight axes

Every solution an engineer ships is scored on all eight stages of the lifecycle, from the artifact that stage produced: the customer's recorded word for Discover, the specification for Design, the running repository for the software build, the powered device for the hardware build, the test results and consensus verdicts for Verify, the live deployment for Ship, the published piece for Tell, and the order or the reasoned refusal for Sell. Scores are given at the Friday review by the mentor of each stage, on a five-point scale with a written reason, and the engineer sees the reason.

20.2 Interest, aptitude, velocity

Over a cohort the radar accumulates three things per engineer. *Interest*: which stages they chose to spend their Vertical Hour and their sampling projects on. *Aptitude*: which stages scored well, on the evidence. *Velocity*: how long each stage took, from gate to gate. By the end of Sampling the three together say, to the engineer and to the council, which vertical they should lead,

and the choice is made by both. Where interest and aptitude disagree, the engineer is told plainly and the choice is theirs, with the evidence in front of them.

20.3 Who sees what

Team totals, shipped work, and the live dashboard are public. An individual's eight-axis profile and the written reasons are visible to that engineer and to the core team only. Health notes never touch the radar. A conduct warning is recorded on the radar as a dated note, visible to the same people.

20.4 Manifestation, not certification

The Academy does not issue certificates. It issues a manifestation portfolio: the deployed artifacts of a cohort, each with its audit receipts, its consensus verdicts, its test results and its customer's word, presented as a phasedoc cockpit that a reviewer clicks rather than reads, and a betadoc that a customer can be shown. Manifestation is evidence that a person built and shipped a governed solution. A credential earned this way renews itself from continued shipping: an engineer who keeps shipping keeps their level.

20.5 Autonomy levels

Level	Meaning	Posture
L0 Assisted	Works under direct mentor review	Proposes; never deploys alone
L1 Supervised	Deploys to a sandbox autonomously	Production needs a mentor's sign-off
L2 Trusted	Owens an outcome end to end with asynchronous review	Runs small engagements; may sign Scoped and Designed gates for others
L3 Forward-deployed	Embeds alone at a customer; mentors the next cohort	Full genome expression; leads a vertical; sits on the council

Table 5. Autonomy levels, adopted from the forward-deployed engineering practice. Levels are assigned at manifestation review and renew from continued shipping.

WHAT THIS MEANS ON MONDAY

- You are scored on the artifact, by the mentor of that stage, with a reason you can read.
- Your profile is yours and the core team's. The team's totals are everyone's.
- You leave with a portfolio a stranger can click, not a paper a stranger must trust.

21 The channel and the content lanes

The channel is the Academy's first product. It is how the hundred patrons find us, how members join, how customers reach us, and how the next cohort is recruited. Every session of the Loop is recorded, every build is filmed, and the evening broadcast turns the day into content. The catalogue of twenty lanes with pair ownership is in Appendix C and on the lanes page of the Academy site; this section states the rules that govern all of them.

21.1 Two tiers and a handout

Daily: one short piece per pair, two to four minutes, cut straight from the half past six broadcast. *Weekly*: one long-form piece per pair, ten to twenty minutes, produced with the content team from the week's footage, published Thursday and Friday. *Always*: a one-page handout with every piece, the workflow file, the schematic, the repository, the benchmark sheet. Free viewers get the video. Paying members get the blueprint. The contact form at the end of every piece is how customers reach us.

21.2 The four beats

Every piece has the same shape, so that production becomes a habit rather than a decision. A fifteen-second hook: the result first, or the failure first, never the introduction. The build, at real speed for shorts and cut for long-form, with screen and bench both recorded. A result with a number: tokens per second, rupees per month, minutes saved, tests passed, one number the viewer can repeat. The handout and the contact path.

21.3 Production rules

- Record everything by default. Screen and bench cameras run all afternoon; footage goes to the content team at half past six.
- A number in every piece. If it was not measured, it is not a result.
- Handout before upload. No blueprint, no publish.
- The Academy's channel, not personal channels. Engineers are the faces; the Academy is the brand.
- Customers and patients are never on camera without written consent. Engineers sign the camera consent in Appendix E and may opt out of any single piece.
- Failure is content. The day's note on what broke is a series, not an embarrassment.

21.4 Patrons and members

We are earning a hundred patrons before we are earning a million viewers. A patron follows the process live, backs it, and is the first customer of the custom work. A member pays a small monthly fee, deliberately under five hundred rupees so that a student can afford it, for the blueprints, the live build calls, the leaderboard, and the path into the next cohort. The members area is the waiting room for the hundreds who applied and were not yet selected, and the Code Arena assessment is its tryout. Membership is therefore also our recruiting funnel.

WHAT THIS MEANS ON MONDAY

- You and your pair own two lanes. You ship a short every day and a long-form every week.
- Every piece has a hook, a build, a number and a handout.
- You are on the Academy's channel under your own name. You may opt out of any single piece before it is cut.

22 Requirements, accounts and services

This section is the inventory of what every engineer is issued on day one and what they must set up before the first bench session, so that nobody spends their first week waiting for access.

The People and HR lead provisions the accounts; the training lead provisions the seats and machines; the bench lead provisions the kits and the lockers.

Issued	For	Provisioned by	Rules	On leaving
Academy email at whitenoiseacademy.-com	Identity for every work and social account, subscription and service	People and HR lead	Used for all accounts; two-factor; no personal email for work	Forwarded for thirty days, then closed
Access card and fingerprint identity	Building, lockers, attendance	People and HR lead	Biometric in at the start and out at the end of every working day, or the day is not counted	Returned; identity revoked
Locker	The kit, the work phone, personal items	Bench lead	Kit and work phone live here outside working hours	Emptied; kit checked back in
Hardware kit	Arduino and ESP32 boards, Raspberry Pi, sensors, breadboards, cables, and the devices a solution needs	Bench lead	Signed out per item; kept in the locker; damage reported, never hidden	Checked back in against the sign-out sheet
Work phone	Every interaction with a customer	People and HR lead	Only device for customer calls, messages and site visits; stays in the locker after hours; never taken home	Returned; wiped
AI seat, highest available tier	The daily work	Training lead	Tied to the Academy email; not shared; Section 14 applies	Seat reassigned
Source-code host organisation membership	Repositories, reviews, the immune system	Training lead	Two-factor; signed commits; Academy email; public by default	Membership removed; credits remain
Cloud cluster access	Experiments, twins, evaluation runs	Forward-deployment lead	Per-engineer cost ceiling; spend above it approved by the lead; nothing left running overnight without a reason	Access removed; resources torn down
Linux workstation	The daily work	Training lead	Encrypted; five-minute lock; no customer data on personal machines	Returned; wiped
Mesh identity	Reaching solutions, twins and customer sites	Forward-deployment lead	One identity per person and per machine; never shared	Revoked
Demonstration gateway and domains	Public demonstrations, betadoes	Forward-deployment lead	Time-boxed; one gateway; registered before exposure	Fronts repointed
The Board at members.wntap.org	Teams, projects, tasks, notices, tickets, checklists; the feed from GitHub and the other connectors	Superadmin (roles) after Google sign-in	Sign in with the Academy Google account; nothing is visible until a role is granted; every write is audited	Role set to none; record kept
Channel and members-area tools	The broadcast, the lanes, the handouts	Content and production lead	Academy channel only; consent rules in Section 21	Access removed; credits remain

Table 6. What every engineer is issued, who provisions it, the rules that bind it, and what happens on leaving.

22.1 Team observability

The Academy runs a team observability tool that shows the cohort what shipped, who is blocked, and how the week is going, and feeds the public dashboard. It observes work, never people: it reads commits, deployments, receipts and the radar, not screens or keystrokes. Every engineer is enrolled at induction with their Academy email; the tool, its address and the sign-in instructions are issued inside the Board (members.wntap.org) once the engineer has signed in and been given a role, together with the mesh identity and the other network details, none of which appear in this docket.

22.2 Life in the building

The in-house pantry has coffee and snacks, and it is a rescue, not a kitchen. Lunch is taken in the building's cafeteria, where reasonably priced meals are available, and it is taken away from the desk as the health rules require. The music rooms are open on Sunday mornings under Section 18. Lockers are personal and are not opened by anyone else without the engineer present, except in an emergency or an investigation under Section 9, and then only with the People and HR lead.

22.3 Day-one checklist

- ☐ Academy email received; password manager installed; two-factor on the email.
- ☐ Access card and fingerprint enrolled; first biometric in recorded.

- ☐ Locker assigned; kit signed out; work phone received and its rules read.
- ☐ AI seat, source-code host, cloud console and the Board (members.wntap.org) signed in with the Academy email and two-factor; the remaining tools and network details collected from inside the Board.
- ☐ Workstation encrypted and locking; first commit made to the cohort repository.
- ☐ Bench safety checklist signed; the induction form signed; this docket read twice.

23 Tools and infrastructure

Every engineer has an AI seat of the highest available tier from day one, a Linux environment, access to the shared cloud cluster for experiments, and a place on the bench. The bench holds microcontroller boards, single-board computers, measurement instruments, a 3D printer, and the consumables for board assembly; the inventory and its safety checklist are in Appendix G.

23.1 The pipeline

The practice's build pipeline is the machine described in the introduction, and engineers drive it from Bootcamp. It converts a written intent into an application with its documentation, through staged and gated automation: a braindoc, a scope of work, a product requirements document, development notes, a security review, marketing material and an operations runbook, with a human at each gate. A testing platform examines the result across many dimensions, including live load and chaos. A virtual Kubernetes engineer deploys and observes it, on the customer's premises or in the cloud, and resolves rather than merely alerts. The delivery discipline is twofold: the phasedoc keeps the builders honest, with a task database, an acceptance test per leaf, and a read-only cockpit that colours itself from live state; the betadoc sells the product, with a public documentation site, a gated live demonstration and a narrated film. The whole is summarised as: develop, observe, test, iterate.

23.2 The mesh and the twins

Solutions run on a private mesh network that joins the customer's premises, the Academy's machines and the cloud, so that the same solution can be deployed as an on-premises instance and a cloud twin without changing the code. Data stays on the premises by default; the cloud is opt-in and gated. Public exposure of a demonstration goes through one gateway, time-boxed, and is never how production traffic is served.

23.3 Registries and the immune system

The machine describes itself. Every port, every long-running service, every model and every remote is registered in a registry file before it goes live, and code reads the registry rather than repeating it. A pre-commit hook, which we call the immune system, refuses a commit that breaks the structure: a directory without its genome file, a port without its row, a fact recorded twice. New capability is born as a new cell with its own genome, by a script we call mitosis, never hand-made.

23.4 Sovereign and local-first

Where a model can run locally, it does. Where a finding matters, it comes from a council of local models of different families, reconciled by an arbiter. Cloud spend is zero by default and every external call passes a redaction gate. This is not austerity. It is the reason we can promise a customer that their data never leaves their building, and the reason our instruments work without an internet connection.

24 Documentation and communication standards

Document or it did not happen is a rule; this section is its mechanics.

24.1 Commits

Work is committed at least daily, to the repository of the cell it belongs to, with a message that says what changed and why in a sentence a stranger can read. Secrets never enter a commit. A commit that changes behaviour carries the test that proves it. The immune system runs on every commit and a red commit is fixed before anything else is done.

24.2 The operating documents

Every cell carries a genome file that says what it is, what it owns, what it depends on and what it must never do, with a lineage header pointing to its parent. The organism as a whole keeps five documents: a board of every project and its state, a vision that changes rarely, a plan that is edited before work begins, a progress log that is appended after work ends, and a memory of durable decisions. The loop is: align with the vision, record intent in the plan, act, record the result in the progress log, and commit. A session that acts without updating the documents has broken the protocol.

24.3 Phasedoc and betadoc

A multi-phase build gets a phasedoc: a task database with an acceptance test per leaf, a plan of record with plain-language phase summaries, an architecture diagram that colours itself from task state, and a small read-only cockpit. A product that will be shown to a customer gets a betadoc: a public site, a gated live application, a demonstration film with narration synchronised to the recorded scenes, and a sign-ins table for demonstration personas. The phasedoc keeps the builders honest. The betadoc sells the product. Neither is optional for work that reaches a customer.

24.4 Meetings and language

The only standing meetings are the Open, the Close and the Friday review. Anything else is a conversation at the bench or a thread in the open. We write in plain English, in short sentences, with the answer first. Numbers go in tables. Claims carry their evidence. A document that a fresh engineer cannot understand on the first day is a document that must be rewritten.

WHAT THIS MEANS ON MONDAY

- You commit daily, with a message a stranger can read, and never a secret.
- You edit the plan before you start and the progress log when you finish.
- Anything a customer will see has a phasedoc behind it and a betadoc in front of it.

PART IV · GROWTH AND GOVERNANCE

25 Roles, reward and growth

The Academy pays its engineers from the first day, rewards them on performance that they can see, and shares its long-term upside with those who build it. The terms are stated here so that nobody has to guess them at hour ten of a long day.

25.1 The internship and the permanent position

Learn, earn and return. Every engineer joins on a strict, assessment-based internship of six months, paid a monthly stipend from the first day, working the ten-hour Loop six days a week

with Sunday off. The sixteen-week curriculum runs inside it; the remaining weeks are product work on the two lines, still assessed. At six months the council decides, on the radar's evidence, the manifestation portfolio, the gates signed, the customer's word and conduct, who is offered a permanent position as a forward-deployed engineer of the Academy at the published starting package. An engineer who is not offered one is told why, with the evidence, and may apply to a later cohort.

Stage	Duration	Day	Pay	Decided by
Internship	6 months	10 hours plus lunch, Monday to Saturday	Monthly stipend, published per cohort	Selection through the Code Arena
Permanent, starting FDE	Ongoing	9 hours minimum per working day	₹4.8 lakh per annum starting package	The council, on the radar, at six months
Stock and options	After 3 years		Allocated on performance	The council, on the accumulated radar

Table 7. The stages of an engineer's engagement and what each pays.

25.2 Stock and options

After three years with the Academy, an engineer becomes eligible for stock and options, allocated on performance. Performance is not a feeling; it is the radar, accumulated over three years, and the verticals led, the cohorts mentored and the customers served. The terms of the scheme are set by the council and published to every eligible person in the same form.

25.3 Vertical leads and the next cohort

The best aptitude is rewarded with career growth and a place in the success story. At the end of each cohort the council names the leads of the eight verticals, from the radar and the engineer's own choice. A vertical lead is an L3 forward-deployed engineer: they embed alone with customers, they mentor the next cohort in their stage, they sit on the council, and they recruit their own team from the hundreds who applied. Growth in the Academy is therefore not a ladder of titles. It is the growth of the organism: each lead becomes a cell that divides.

25.4 Promotion criteria

Every move, from L0 to L3, from engineer to lead, from lead to core team, is made on written criteria that are published before the cohort begins and applied to everyone alike. The criteria are evidence on the radar, gates signed, solutions in customers' hands, pieces published, and conduct. They are never seniority, never friendship, and never the lines listed in the non-discrimination rule. The reasoning for every decision is written down and shown to the person it concerns.

25.5 From headcount to throughput

We do not measure the Academy's value by the number of people in it. We measure it by cycle time and time to value, by the consistency of what we ship, by the marginal cost of the next unit, and by what we can sustain, all bound by trust. This is why a small cohort with a machine behind it is worth more than a large one without, and why growth is measured in verticals that work rather than in seats that are filled.

WHAT THIS MEANS ON MONDAY

- You are paid from today. At six months, on the evidence, you are offered the permanent starting package.
- Every decision about you is made on evidence you can see, by criteria published before you started.
- After three years, on performance, you own part of what you built.
- If you lead a vertical, you recruit your own team.

26 Attendance, leave, holidays and pay mechanics

26.1 Attendance and the working day

Attendance is recorded by the biometric at the start and at the end of every working day. A day with only one of the two recorded is not counted as a working day unless the People and HR lead corrects it on evidence the same week. During the internship the working day is ten hours plus lunch, six days a week, Monday to Saturday, with Sunday off; the Loop in Section 17 is laid out to fit it, and the Wednesday stop at half past five under the health rules stands. After confirmation to a permanent position, the minimum is nine hours per working day. Time at the bench, in the field with a customer, and at the live build all count; time on the music club, at the cafeteria and in the pantry does not.

26.2 Leave

Earned leave, sick leave and casual leave accrue as the law of the state where the engineer works requires, and the current entitlements are published by the People and HR lead at the start of each cohort and applied to everyone alike. Sick leave is taken on the physician's word, without a form on the day. Maternity and paternity leave follow the law and the Academy's published policy, and a person on such leave keeps their place and their radar. Leave during an internship is granted as the assessment

permits and never withheld for illness. Leave is requested in writing to the People and HR lead and the forward-deployment lead, and a customer commitment is handed to another engineer before the leave starts, never dropped.

26.3 Holidays

The holiday calendar for the year is published at the start of each cohort, covering the national holidays and the regional festivals of the state where the cohort is hosted. A cohort hosted in Odisha observes Odisha's festivals. An engineer of any faith may swap a listed holiday for a festival of their own with a week's notice.

26.4 Pay mechanics

The internship stipend and the permanent salary are paid monthly into the engineer's own bank account, by the last working day of the month, with a payslip that shows the gross amount, every statutory deduction and the net amount. Statutory contributions, including provident fund and state insurance where applicable, are made as the law requires and appear on the payslip. Expenses incurred for the Academy, including travel to a customer, are claimed with a receipt within the month and reimbursed with the next pay. Questions about pay go to the People and HR lead and are answered in writing within a week.

WHAT THIS MEANS ON MONDAY

- Biometric in when you arrive, biometric out when you leave, every day, or the day does not count.
- Ten hours plus lunch, Monday to Saturday, Sunday off, during the internship. Nine hours minimum once permanent.
- Your payslip shows everything. Your receipts get you your money back next month.

27 Joining the family

The family grows by addition. Each circle has its own way in, receives something specific, and is bound by the part of this docket that applies to it. Nobody is in the family by accident, and nobody is in it without having agreed to be.

Circle	How they join	What they receive	Bound by
User	Uses a published solution or watches the channel	Free access to what is public	Community norms
Member	Pays the monthly membership	Blueprints, live build calls, the leaderboard, the path to the next cohort	Community norms; membership terms
Patron	Backs the process; follows live	First call on custom work; a seat at the demo day; their name in the credits	Community norms; the public-by-default terms
Customer	Named at Discover; signs the customer terms	A solution, an instrument, and the engineer who built it, in person	Customer terms; the data and IP clauses
Contributor	A pull request that passes the immune system and the code of conduct	Credit in the artifact; a route into a cohort	Code of conduct; the licence
Partner	Agreement with the council	A cohort hosted, a curriculum licensed, or a product co-built	Partner agreement; ethics; conduct
New engineer	Assessment, selection, induction, the induction form	Everything in this docket	Everything in this docket

Table 8. How each circle joins, what it receives, and what binds it.

27.1 Induction

A new engineer is inducted on the first day of a cohort with this docket, read twice, and the induction form signed. A new member of the core team is inducted the same way, with the mentor undertakings added. A contributor is inducted by the repository's contributing guide, which points here. A partner is inducted by the council, with the partner agreement. The docket is the same text for everyone; only the forms differ.

27.2 Leaving

A person may leave the family at any time. What they take with them is their skills, their portfolio, the public work with their name on it, and the Academy's thanks. What they leave behind is the confidential information covered by the non-disclosure acknowledgment, which survives for two years, and the customer relationships, which belong to the Academy. A person who leaves in good standing may return to any circle.

28 Your first thirty days

The best handbook page is the one that tells a new person what will actually happen. This is that page. A buddy from the previous cohort, or from the core team for Cohort 1, is assigned on

day one and is the person to ask anything that seems too small to ask a mentor.

When	What happens	What you will have by the end
Day 1	Induction: this docket read twice; the induction form; email, card, fingerprint, locker, kit, phone, seat; the bench safety walk; your buddy	Every account working; your first commit; the safety checklist signed
Days 2 to 5	The Loop begins. First Principles from number systems; the bench from the first LED; version control and the loop; your first sixty-second introduction in Voice	A working microcontroller on your bench; a daily artifact shipped four days running
Week 2	Project zero: the radar tracker, built by the cohort; models and prompting; the redaction gate; the one-minute pitch; the first walk into the college and the town to find a customer	A named customer; the Scoped gate; your pitch on the Friday of week two
Week 3	Sampling begins with Discover; probability and sensors; your first small solution starts; your first short on the channel	A brief a stranger can read; a piece published under your name
Week 4	Design: filters and the oscilloscope; schematic and first board layout; schema and contract; the Designed gate; your first Friday radar review with all eight axes scored	A specification; a board on order; your first radar profile, read with your buddy
Throughout	The weekly check-in with the physician and physiotherapist; the Wednesday stop; Sunday off, with the music club open at ten	A pace you can sustain for sixteen weeks

Table 9. The first thirty days.

28.1 Questions you will have

Where do I sit: at the bench assigned by the bench lead, with your locker beside it. What if I break a board: report it, sign out another, and write what you learned in the failure file. What if I cannot find a customer: your buddy and the forward-deploy-

ment lead walk into the town with you on the Thursday of week one. What if I am behind: say so at the Open; the Loop is designed so that a day is never lost silently. What if the load is too heavy: the physician, on Monday, in confidence. Everything else is in Appendix I.

29 Governance

29.1 The council

The Academy is governed by a council made up of the core team of eight and the L3 vertical leads. It decides confirmation, promotion, removal, the choice of product-line solutions, partner agreements, the stock and options scheme, and amendments to this docket. It meets after the Friday review and whenever a decision cannot wait. Its decisions and their reasoning are recorded in the memory document, and the decisions that concern a person are shown to that person.

29.2 Ratification

This docket is ratified at the induction of each cohort. Ratification means that every engineer has read it twice, has had their disagreements heard, and has signed the induction form. A docket that a cohort has not ratified does not bind that cohort, which is why induction is not a formality.

29.3 Amendments

Anyone in the engineer, core-team or partner circles may propose an amendment, in writing, with the reason. The council hears the proposal at its next meeting, with the proposer present. An amendment passes by a majority of the council and takes effect at the next cohort's ratification, unless the council judges it urgent, in which case it takes effect on publication and is presented for ratification retrospectively. Every amendment increments the docket's version and is recorded with its reason. The genomic rules in Section 7 and the code of conduct in Section 9 require a two-thirds majority.

29.4 Disputes

A dispute about work follows Section 9. A dispute about a council decision may be appealed once, in writing, to the council, which hears it with the appellant present and the members who made the original decision recused from the vote. A dispute that the council cannot resolve is referred to an independent person agreed by both sides, whose finding the council accepts.

29.5 Who decides what

Decision	Who	On what evidence
What an engineer builds this cycle	The engineer, with the forward-deployment lead	The named customer; the radar
Whether a gate is passed	The mentor of that stage	The stage's exit criterion
Which vertical an engineer leads	The engineer and the council together	Interest, aptitude, velocity on the radar
Confirmation, promotion, removal	The council, with the People and HR lead	The radar; the portfolio; conduct; the person heard
Product-line solutions	The council	The week-two pitches
Rest days and fitness to work	The physician	The check-in; not shared
Amendments to this docket	The council; two-thirds for Sections 7 and 9	A written proposal and its reason

Table 10. Who decides what, and on what evidence.

29.6 Versioning

The docket carries a version and a date on its title page. The current edition is always the one published on the Academy site, and the printed copy handed at induction is that edition. Earlier

editions are archived, with their cohorts' signatures, and remain the terms those cohorts ratified until they ratify a later one.

Appendix A The Loop on one page

Time	Block	Mon	Tue	Wed	Thu	Fri	Sat
09:00	Open	Cycle planning	Stand-up	Stand-up	Stand-up	Stand-up	Stand-up
09:15	First Principles	Six-beat lesson, common to all					
10:00	The Bench	Fabrication and measurement, filmed					
12:30	Lunch	Away from the desk					
13:30	Voice	Health check-in	Workshop	Workshop	Workshop	Workshop	Workshop
14:30	Vertical Hour	One stage, six beats, one artifact					
15:30	Forward Deployment	Own solution	Own solution	Own solution, stop 17:30	Own solution	Demo and Radar Review; Live Build 17:00	Own solution
18:30	The Broadcast	Ship	Ship	Written note only	Ship; long-form published	Ship	Ship
19:30	Close	Radar	Radar		Radar	Radar; council	Radar

Table 11. The week at a glance. Saturday follows the Tuesday column. Sunday is fully off; the music club is open 10:00 to 13:00, voluntary.

Appendix B The sixteen-week curriculum

Four tracks, one row per week. Each cell names the lesson topics for that track; each lesson is six beats and produces an artifact. The code track follows the forward-deployed engineering lesson spine.

Wk	Phase	First Principles	The Bench	Code and models	Voice	Gate
1	Bootcamp	Number systems; binary and logic; what a signal is	Multimeter; power supply; breadboard; first LED and switch	Git and version control; the FDE mindset and the loop; reading a use case	Introduce yourself in sixty seconds; listening	
2	Bootcamp	Gates to registers; clocks; the state machine	Microcontroller first boot; GPIO; serial console	Models and prompting; local versus cloud and the PII gate; skills, pipelines and agents; project zero: the radar	The one-minute pitch; the customer conversation	Scoped
3	Sampling: Discover	Probability; sampling; noise	Sensors: analogue in, ADC, calibration	Market sizing; competition and gap; niche discovery; spec-driven framing	Interviewing a customer	
4	Sampling: Design	Ohm, Kirchhoff; RC filters; the oscilloscope	Schematic capture; first board layout	Build versus buy; schema and API contract; agentic planning	Writing a spec a stranger can read	Designed
5	Sampling: Build software	Bus: I2C, SPI, UART; timing diagrams	Talking to a peripheral on each bus; logic analyser	Tool servers and coding agents; context-engineered pipelines; server-rendered services	Explaining a system on a whiteboard	
6	Sampling: Build hardware	Power: regulators, batteries, protection; thermal	Enclosure CAD; first print; assembly	Firmware structure; edge run-times; on-device inference	The demonstration: showing, not telling	
7	Sampling: Verify and Ship	Linear algebra for signals; matrices; transforms	Bench test procedure; measuring what you claimed	Testing across dimensions; consensus and adversarial verification; deployment and secrets; observability	Writing the failure note	Governed
8	Sampling: Tell and Sell	Information: entropy, compression, error correction	Instrument panel: knobs, encoders, displays	Audit receipts; marketing with AI; community; ticket and support automation	The ninety-second piece; the handout	
9	Lock-in	Small language models: tokens, embeddings, attention from first principles	Vertical bench: the stage you chose	Task-specific model selection; small tuning; data model for your domain	The pitch to a patron	
10	Lock-in	Fine-tuning: adapters, quantisation, evaluation	Vertical bench	Ingestion and PII-gated intake; fine-tuning on the platform; evaluation in your language	Interview practice: technical	
11	Lock-in	Control: feedback, PID, stability	Vertical bench; the legacy bridge	Mixture of cloud; cost routing; privacy and residency; threat modelling	Negotiating scope with a customer	
12	Lock-in	Networks: the mesh, addressing, access control	Vertical bench; the field install	Mesh and role-based access; the on-premises twin; the cloud twin	The status update nobody dreads	Governed
13	Ship	Reliability: failure modes, MTBF, safety margins	Pre-production batch; safety tests recorded	The phasedoc; the betadoc; the narrated film	Narration for the film	
14	Ship	Economics of a unit: cost, margin, price	Assembly line: the first fifty	Pre-orders; payments; support automation live	The launch piece	
15	Ship	Review week: the concepts you still cannot explain	Field deployment with customers	Field fixes; observability in the customer's building	Demo day rehearsal	
16	Ship	Manifestation: presenting your portfolio	Demo day	Manifestation review; autonomy level	Demo day	Manifested

Table B.1. The sixteen-week curriculum. The Vertical Hour rotates one stage per week in weeks three to eight and is locked from week nine.

Appendix C Content lanes catalogue

Twenty lanes in five clusters. Each pair owns two home lanes; the four lanes of cluster E rotate weekly across all pairs. Pairs choose at induction and may swap at the Friday review; a lane is never dropped.

#	Lane	Format	Why now	Our edge	Pair
Cluster A · Agents and coding					
01	Live agent build, prompt to deployed	One idea, one agent, one deploy, in a single unbroken video	The format behind the fastest-growing AI channels this year	We deploy to a real domain, not a local demo	P1
02	Coding agent head-to-head	Same task to several agents; scored on time, cost, correctness	Professional adoption of these tools doubled in the first half of the year	Many seats means real parallel trials	P2
03	The thirty-minute build show	A caller's application shipped on air, Friday at five	Nobody does this live	The pipeline exists and is rehearsed daily	P1
04	Automation for one real Indian business	A workflow for a shop, a clinic, an office, with the customer on camera at the end	Automation is the second-fastest-growing niche; almost none of it is built here	The town is our customer list	P2
Cluster B · Evaluations and benchmarks					
05	Release day, tested within a day	A new model run on our hardware and published the same day	Channels that publish within a day of a release own its search traffic	GPUs and many hands; first in India	P3
06	Low-memory and cheap-hardware workflows	What runs on a small GPU, a small desktop, a single-board computer	The most-viewed workflow videos are the ones on modest hardware	Every tier of hardware on the bench	P3
07	Small models in Indian languages	Odia, Hindi, Telugu on real tasks	Nobody covers this seriously; it is also our product line	Native speakers; the fine-tuning platform	P4
08	Vision and image models, physical edition	Evaluations where the camera points at the bench, not at stock images	Real-object evaluations are rare	The bench is always on camera	P4
Cluster C · Boards, protocols and the edge					
09	Language models on microcontrollers	Reproduce the summer's small-model-on-a-microcontroller result, then push it	The maker story of the season	Boards on the bench; firmware from the curriculum	P5
10	Board of the week	A board unboxed, benchmarked, given a real task, filmed at the bench	Evergreen search on every board name	Bench mentors who go to silicon depth	P5
11	Protocol explainers with a live wire	The morning lecture on a bus becomes a video with a probe on the wire	Protocol content is mostly slides	Multi-bus comms is a core skill of the product line	P6
12	The legacy bridge	Old laboratory and factory systems talking to a modern agent	Almost nobody makes this; every factory needs it	Exactly the deep integration the instruments sell	P6
Cluster D · Concepts and illustration					
13	First principles, animated	Every morning lesson becomes a five-minute illustrated explainer	Evergreen and searchable; the diagram is the handout	The curriculum produced once, sold forever	P7
14	Paper of the week, built	A recent paper reproduced in small form on our hardware	Summaries are everywhere; reproductions are trusted	All engineers trained in the field	P7
15	The failure file	What broke today and why, as a series	Audiences trust failure content	The broadcast rule produces it daily	P8
16	The instrument	An analogue-looking device with a digital brain, episode by episode	The flagship series; the seed of the product line	Instruments, not apps	P8
Cluster E · The company in public (rotates weekly)					
17	The live dashboard walkthrough	What the radar says this week; who shipped; which customers came in	Transparency turns viewers into patrons	The dashboard is public; we read it aloud	all
18	Engineer diaries	One engineer, one week, ninety seconds a day, stitched on Friday	The faces the narrative needs	Every engineer is a protagonist	all
19	Custom design workshop	A customer's need turned into a kit or a printed part on camera, then shipped	The sales funnel for the fab line, as content	Printer, board ordering and bench are here	all
20	Security and red-teaming AI	Prompt injection, permission escapes, sandbox breaks, shown and fixed	High trust, low competition	The assessment already tested everyone on it	all

Table C.1. The content lanes catalogue with pair ownership.

Appendix D The product catalogue

The solutions already shipped or in active build by the practice behind the Academy, one line each, so that a new engineer sees the shelf they can build on. The board of every project and its live state is the source of truth; this table points to it.

Domain	Solution	What it is	State
Health	Dental college EMR	Electronic medical record in daily use at a dental college, on-premises	Live
Health	White-label EMR and demonstration twins	Generic and Indian-audience EMR showcases with narrated films and gated demos	Shipped
Health	Medical examination question bank and campus kiosk	Practice platform and a kiosk for a medical campus	Live
Health	MRI analysis platform	Brain-scan visualisation with anomaly detection	Shipped
Law	Law-Lite	Legal-practice assistant with a public demonstration twin	Live
Agriculture	Agribot	Smart-farm operations platform for a large rosemary and turmeric agribusiness	Planned, complete design
Agriculture	KrishiData	Offline-first field data collection for agricultural surveys	Shipped
Education	GIET Code Arena	The assessment platform this cohort was selected through; home of the schedule, lanes and this docket	Live
Education	Python mastery platform	Browser-based Python learning with real execution and progressive challenges	Shipped
Education	MIRA	Multilingual Indian regional AI for education	Shipped
Voice	Aria	Voice-first agent over the practice's full capability: speak the intent, work is delegated, progress narrated back	Live
Voice	Desk worker	Telephone agent that answers and acts with the practice's tools	Active
Infrastructure	Virtual Kubernetes Engineer	Deploys, observes and remediates clusters; on-premises, cloud and air-gapped editions	Active, public appliance
Infrastructure	Betadoc cloud	The demonstration platform: public sites, gated apps, narrated films, the exposure chain	Active
Infrastructure	GPU Bench	Benchmarking of models across hardware tiers	Shipped
Infrastructure	Switchboard, memory, image generation	The one model gateway, sovereign recall, and local image generation behind it	Live
Developer tools	AiNa	Intent to application: braindoc, scope, requirements, code, reviews, run-books, through gated automation	Live
Developer tools	TestForge	Testing platform across more than twenty dimensions with live load and chaos	Live
Developer tools	Fine-tuning platform	Training and evaluation of small domain models, public	Public
Developer tools	Data team plugin	A whole data team as one command: medallion pipeline, semantic layer, analysis, publicly installable	Public
Developer tools	Agent-native command lines	Harnesses that make existing software usable by agents	Public
Orchestration	Command centre, office, dispatcher, cadence	The frames through which one brain orchestrates agents, delegation and rhythm	Live
Orchestration	SeaClip and companions	Hub-and-spoke agent orchestration for on-premises edge meshes; pipeline dashboards; device health probes	Shipped
Security	SecurePulse	Enterprise security scanning platform	Shipped
Situational awareness	World monitor	Real-time intelligence dashboard aggregating news, geopolitics and infrastructure	Shipped
Team	Team pulse	Remote-team productivity observability for the practice's own use	Active

Table D.1. The product catalogue, curated from the project board. More than eighty cells exist on the board; these are the ones a new engineer is most likely to build on.

Appendix D2 Cloud, on-premises and hybrid: the responsibility matrix

Every solution the Academy deploys runs somewhere, and somewhere has an owner. This appendix states, for each place a solution can run, who is responsible for what: the platform that provides the infrastructure, the Academy that builds and operates the solution, and the client whose data and users it serves. It is written so that an engineer can answer a client's security questionnaire from it, and so that no gap between "we assumed they did it" and "we assumed you did it" is ever discovered after an incident. It follows the shared-responsibility model that the large cloud providers publish and that industry compliance frameworks expect, adapted to the way we actually deploy.

D2.1 The shared-responsibility model

A cloud provider is responsible for the security *of* the cloud: the physical data centres, the hardware, the hypervisor, the managed services it sells, and the availability of its regions and zones. The customer of that cloud, which for our solutions is the Academy, is responsible for security *in* the cloud: the operating

systems and runtimes it deploys, the patches on them, the identities and permissions it grants, the network rules it writes, the encryption it turns on, and the data it chooses to place there. The client is responsible for its own premises, its own users, the truth of the data it gives us, and the decisions it makes about what may leave its building. Where a managed platform sits between us and the cloud, such as a hosting platform, an authentication service or a managed database, that platform inherits the provider's duties for the layer it manages, and we inherit the customer's duties for how we configure and use it.

D2.2 The four deployment lanes and their boundaries

We deploy in four lanes. The lane decides where data lives, who logs in and how, and therefore who is responsible for what. A solution is never moved between lanes without the change being recorded and the client informed.

Lane	Where it runs	Who logs in and how	What data it holds	Purpose and boundary
1 Public demonstration (betadoc)	A public site on a hosting platform; the live application on the Academy's machines, exposed through one time-boxed gateway	Demonstration personas with a PIN, device-bound; no email, no client credentials, no self-registration	Synthetic data only. Never a client's data, never a real person's	Shows the product. Nothing in this lane is production and no client secret ever touches it
2 On-premises	The client's own servers, or the Academy's sealed appliance installed in the client's building	Device-bound PIN through the private mesh network, with role-based access; optionally the client's own directory	The client's data, in full, which never leaves the building	Sovereign by default. The Academy reaches it only through the mesh, with the client's consent, for support
3 Cloud twin	Hosting platform for the front end and functions; managed authentication; managed database in a chosen region	Real credentials through the managed authentication service: email or single sign-on, multi-factor, and a tighter role-based access model	Only what the client has agreed may be processed off-premises, after the redaction layer; encrypted at rest and in transit	Reach and availability. The twin serves what must be reachable from anywhere; the rest stays on-premises
4 Hybrid	Lanes 2 and 3 joined by the mesh	As lanes 2 and 3; one identity per person, one per device	Data classified per field: what stays on-premises, what may be mirrored to the cloud, what is redacted before it moves	Most production deployments. The classification table in the client agreement is the boundary

Table 15. The four deployment lanes. The lane a solution runs in decides who is responsible for what.

D2.3 Who is responsible for what

Concern	Platform provider	White Noise Academy	Client
Physical security, hardware, hypervisor, regions	Cloud provider, for lanes 1 and 3	For the office servers and the appliance	For their own premises in lanes 2 and 4
Operating system and runtime patches	Managed platforms patch their own layer	Our appliance, our office servers, our containers, our functions, within the published patch window	Their own servers in lane 2 unless the agreement gives it to us
Application code, dependencies, vulnerabilities		Always. Dependency scanning in the pipeline; fixes within the published window; the client told of any vulnerability that touches their data	
Identity and authentication	The managed authentication service secures its own platform	Configuration: roles, least privilege, multi-factor enforcement, session limits, token rotation, device binding	Their users' conduct; who is granted a role; removing leavers promptly
Credentials and secrets		Deployment keys and service credentials, in the keys file and the runtime secret store, rotated on a schedule and on any exposure	Their own account credentials and any keys they issue to us, which remain theirs and are revoked by them on exit
Client data: ownership and placement		Custody only, in the lane and region the agreement names; never exported to another location; never worked on outside the office	Ownership, always. The decision of what may leave the building
Personally identifiable information		The redaction layer before any external call, with its audit log; minimisation; retention limits	The lawful basis for collecting it; consent from their users
Encryption	At rest on managed databases and storage	In transit everywhere; at rest on the appliance and the office servers; key custody for what we encrypt	Key custody for anything they encrypt before giving it to us
Network	Provider network, DDoS protection at the edge	Mesh access rules, the single gateway, firewall on our machines, no public exposure of production	Their own network and the devices they enrol on the mesh
Backups and recovery	Managed database backups at the platform's stated cadence	Office RAID server and off-site copy for our data; appliance backups on the client's own storage; restore tested quarterly	Backups of their own systems; providing the storage for appliance backups
Availability	Multi-zone hosting and database availability in lanes 1 and 3	Redundant services on the appliance where the agreement asks; monitoring; the recovery objectives in the agreement	Power, connectivity and physical access for lane 2
Monitoring, logging, audit	Platform logs	Application observability, audit receipts for every state change, scrubbed logs, retained as agreed	Reviewing the access reports we send
Incident response	Provider notifies of platform incidents	Containment, truthful notification to the client within the agreed hours, the written record, the fix	Notifying their users and regulators where the law requires
Compliance evidence	Provider certifications and reports	Our controls, this matrix, the audit receipts, the phasedoc cockpit	Their own regulatory obligations

Table 16. The responsibility matrix. An empty cell means no responsibility for that party in that row.

D2.4 Where data lives

Data is classified before a solution is designed, field by field, into four classes: public, internal, confidential, and client personal data. Public data may live anywhere. Internal data lives on the Academy's machines and in the cloud twin. Confidential data, which includes a client's business information, lives in the lane the agreement names and nowhere else. Client personal data lives on the client's premises by default; it enters the cloud twin only after the redaction layer has removed what identifies a person, only for the fields the client has agreed to, and only in the region the client has chosen. Nothing in any class is exported to another location, copied to a personal device, or worked on outside the office. The office holds a RAID server for the Academy's own data and for client data that the agreement places with us, with an encrypted off-site copy, and the appliance in a client's building backs up to the client's own storage.

The redaction layer is part of every solution we build, not an add-on. It sits between the application and every external service, including every model that is not running locally, and it detects and removes names, identifiers, contact details, and the other markers of a person before the call is made. Its log is an audit receipt. A demonstration in lane 1 uses synthetic data and therefore never needs the layer to protect a real person, but the layer is present so that the demonstration shows the real product.

D2.5 Identity, access and role-based control

Lane 1 uses demonstration personas and a PIN, bound to the device that first opened the demonstration, with no email and no self-registration, so that a public demonstration can never become a door into anything real. Lanes 2 and 4 reach the application through the private mesh network, which is itself an identity: every person and every device has its own, access rules are written per solution, and a device that is not enrolled cannot see the application at all. Within the application, a device-bound

PIN identifies the person and a role decides what they may do. Lane 3 uses the managed authentication service in the Academy's stack, with real credentials, multi-factor enforced, sessions limited, and a tighter role-based model in which every role is written down with the actions it permits, the least privilege that does the job is granted, and a leaver's access is removed the day they leave. The client decides who gets a role; the Academy configures what the role can do; the authentication platform secures its own service.

D2.6 Patches, credentials and rotation

Managed platforms patch their own layers: the hosting platform its edge and functions runtime, the authentication service its own systems, the managed database its engine. The Academy patches everything it deploys: the operating system and runtime on the appliance and the office servers, the containers, the functions' dependencies, and the application itself, within a published window that is shorter for a vulnerability that touches client data. A client that runs the solution on its own servers patches those servers unless the agreement assigns that to us. Every credential has an owner, a place, and a rotation date. Deployment keys and service credentials belong to the Academy, live in the keys file and the runtime secret store, are never in a repository or a chat, and are rotated on schedule and immediately on any exposure. A credential the client issues to us remains the client's; it is revoked by them at the end of the engagement, and we confirm in writing that we hold no copy.

D2.7 The build and deployment pipeline

Source lives on the source-code host, with the main branch protected, commits signed, and every change arriving by a reviewed pull request that the immune system has passed. The continuous integration run executes the test platform across its dimensions, the dependency scan, and the consensus review by a council of models, and a red run does not deploy. Deployment is by the pipeline, never by hand: to the hosting platform for lane 1 and 3 fronts, to the virtual Kubernetes engineer for the appliance and the twin's services, with secrets injected at runtime from the secret store. Engineers work in the harnesses the Academy provides, the terminal multiplexer sessions, the coding agents and the fleet harness, all under the Academy identity, and none of those tools ever holds a client secret or a client dataset. What an agent does to a deployment is logged as a receipt exactly as what a person does.

D2.8 Availability and redundancy

The cloud twin is deployed across multiple availability zones on the hosting platform and the managed database, so that the loss of one zone does not take the solution down. The appliance is deployed with redundant services where the agreement asks for it, and always with monitoring that resolves rather than merely alerts. The office RAID server tolerates the loss of a disk without loss of data and is backed up off-site. Recovery objectives, meaning how quickly a solution is restored and how much data may be lost, are stated in the client agreement per lane, and a restore is rehearsed every quarter so that the objectives are known to be true rather than believed.

D2.9 Compliance and the law

The controls above are mapped, in the client agreement, to the frameworks the client is subject to: the well-architected security practices the cloud providers publish, the international information-security standard's control set, and the sector rules that apply, such as those for clinical data. Personal data of people in India is handled under the Digital Personal Data Protection Act, 2023: collected for a stated purpose, with consent where consent is the basis, kept no longer than needed, and deleted on request. Where a client is subject to a foreign regime, the agreement says which lane and region satisfies it. The Academy does not claim a certification it does not hold; it provides its controls, this matrix, its audit receipts and its cockpit as evidence, and it supports the client's own auditors.

D2.10 What every engineer must do

- Classify the data before designing. Know the lane before deploying. Write both down in the specification.
- Never move a solution or its data between lanes, regions or locations without the change recorded and the client told.
- Never carry client data out of the office, onto a personal device, or into a tool that is not the Academy's.
- Put the redaction layer in front of every external call, and keep its log.
- Own the credentials you are issued: know where they live, when they rotate, and who revokes them.
- Deploy through the pipeline only. If it did not pass, it does not ship.
- When something goes wrong, contain it, tell the client the truth, write it down, then fix it.

Appendix E Forms

One page is signed at induction. It carries the five undertakings of this docket, the code of conduct, non-disclosure, camera and code consent, health and bench safety, and the sign-off, so that the engineer reads them together, signs once, and hands the

page to the People and HR lead for filing; the engineer keeps the rest of the docket. A page signed under pressure is void; a page not understood is not signed until it is.

E.1 Induction acknowledgments, consents and sign-off

I have read the White Noise Academy Induction Docket, version 1.3, twice. My disagreements, if any, have been heard and are recorded below or in an amendment proposal. I accept the docket as the terms of my engagement and I undertake the following.

A. Code of conduct (Sections 7 to 13)

1. The genomic rules, the ethics and the code of conduct apply to me in the building, on the bench, on the channel, in the repositories and wherever I represent the Academy.
2. The Academy does not discriminate on the grounds listed in Section 9, and neither will I.
3. Harassment as defined in Section 9 is grounds for removal; retaliation against a person who reports is the more serious breach. I may report to the People and HR lead or any member of the core team and will be protected for doing so.
4. The consequences in Section 9 apply to me.

B. Non-disclosure (Section 12)

1. I will not disclose customer or patient data, a customer's unpublished deliverables or business information, credentials or keys, product plans the council has marked confidential, or the personal information of other members of the family, to anyone outside the Academy who is not entitled to it.
2. Keys and secrets live only in the designated place, never in a repository, a chat or a recording. Client data is never used to train a model without written consent.
3. Work for a customer under a customer agreement is the customer's property; work for the Academy is published under the Apache 2.0 licence with my name credited.
4. I will declare any conflict of interest or outside work to the People and HR lead before working on anything it touches. These undertakings survive my engagement by two years.

C. Camera, code and radar (Sections 12, 20, 21)

1. I am on camera by default during sessions, at the bench and in the broadcast; my image and voice may be published on the Academy's channel and members area under my own name. I may opt out of any single recording or publication by saying so before it is cut, without question.
2. Code and documentation I produce for Academy solutions are published in the open under the Apache 2.0 licence.
3. My work is scored on the eight-axis radar; my scores and reasons are visible to me and the core team only; team totals and shipped work are public.
4. I will not record or publish any customer or patient without their separate written consent.

☐ On camera by default ☐ Ask me before each recording (no effect on standing)

D. Health and bench safety (Section 13, Appendix G)

1. I have disclosed to the physician, in confidence, any condition, medication or allergy that could affect my safety at the bench or my fitness for a long day; I will attend the weekly check-in and take a rest day the physician declares.
2. I will keep the hours in Section 13, including the Wednesday stop and the Sunday off, and will not ask others to break them.
3. I have read the bench safety checklist and been shown the extraction, eye protection, the fire-safe cell container and the emergency numbers; I will report every injury and near miss the same day; I will not work on live mains or leave a lithium cell charging unattended.

Full name

Roll or employee number

Cohort and start date

Emergency contact and number

Disagreements recorded

Engineer, signature and date

For the Academy (People and HR lead), signature and date

Witness (physician or training lead), signature and date

Appendix F Glossary

Arbiter. The model or person who reconciles a council's findings into a verdict.

Betadoc. The client-facing package for a product: a public site, a gated live application, a narrated film, and a sign-ins table. It sells the product.

Broadcast. The half past six block in which the day's artifact is shipped and the footage handed to the content team.

Cell. A directory, a service, or an engineer that carries the genome and expresses one faculty at a time. The unit of growth.

Consensus. Agreement between instruments of different families. What only one asserts is a suspect.

Council. The core team of eight plus the L3 vertical leads; the governing body.

FDE. Forward-deployed engineer: one who goes to where the problem is and owns the solution end to end.

Gate. A human sign-off that an exit criterion is met: Scoped, Designed, Governed, Manifested.

Genome. The rules every cell carries whatever it expresses; Part II of this docket. Also the file each cell carries describing what it is.

Handout. The one-page blueprint that ships with every piece: workflow, schematic, repository, or benchmark sheet.

Immune system. The pre-commit hook that refuses a commit which breaks the structure.

Instrument. A device with physical controls and a digital brain, built for one domain. What we make.

Learn, earn and return. The internship's motto: learn in the Loop, earn from day one, return by mentoring and recruiting the next cohort.

Line 1, Line 2. The domain small-language-model line and the fab and custom-instrument line.

The Loop. The daily cycle: Open, First Principles, Bench, Voice, Vertical Hour, Forward Deployment, Broadcast, Close. Also the loop within it: understand, formulate, optimise, ship.

Manifestation. Evidence that a person built and shipped a governed solution; the portfolio that replaces a certificate.

Member. A paying subscriber to the academy's blueprints, calls and leaderboard.

Mitosis. The script that mints a new cell with its genome. New capability is born, not hand-made.

Named customer. A person with a name, a problem and a reason to care, on record, before design begins.

Patron. A person who follows the process live and backs it; the first customer of custom work.

Phasedoc. The builders' window on a multi-phase build: task database, acceptance test per leaf, self-colouring architecture, cockpit. It keeps builders honest.

Radar. The eight-axis, evidence-scored profile of an engineer's work; the record on which verticals, confirmation and reward are decided.

Six-beat lesson. Motto, Problem, Concept, Build it, Use it, Ship it. Every taught topic.

Vertical. One of the eight lifecycle stages as a line of specialisation, led by an L3 engineer.

Appendix G Bench inventory and safety checklist

G.1 Inventory, Cohort 1

Item	Quantity	Custodian
ESP32 development boards	8	Bench lead
Arduino boards	8	Bench lead
Raspberry Pi single-board computers	8	Bench lead
3D printer	1	Bench lead
Linux workstations and AI seats	one per engineer	Training lead
Cloud cluster access	shared	Forward-deployment lead
Multimeters, oscilloscope, logic analyser, bench supply, soldering stations with extraction	per bench	Bench lead
Fire-safe lithium cell container; first-aid kit; extinguisher	1 each	Physician; bench lead

Table 17. Bench inventory at the start of Cohort 1. The registry file is the source of truth; this table points to it.

G.2 Safety checklist, signed before the first bench session

- ☐ I know where the extraction, the eye protection, the fire-safe container, the extinguisher, the first-aid kit and the emergency numbers are.
- ☐ I will wear eye protection when soldering, cutting or drilling.
- ☐ I will never work on live mains voltage and never expose it on a shared bench.
- ☐ I will charge lithium cells under observation, in the fire-safe container, and never leave one connected overnight.
- ☐ I will not leave the 3D printer unattended for long prints and will keep the ventilation on.
- ☐ I will handle static-sensitive parts on the earthed mat.
- ☐ I will report every injury and near miss the same day.
- ☐ I will stop when the bench lead says stop.

Appendix H Cohort 1

Cohort 1 of the engineering programme is hosted at GIET, Gunupur, Odisha. Its engineers were selected through the Code Arena assessment, an online examination of thirty Python challenges taken by forty-six students over two days, from more than six hundred who sought the opportunity. Sixteen were selected for the cohort; the rest are the first members of the waiting room described in Section 21, and the first candidates for

Cohort 2. The cohort runs sixteen weeks from its induction date, in the Loop described in Section 17, with the core team of eight named in this edition's title page before printing.

The Academy's site for the cohort carries the live schedule, the content lanes, this docket, and, once built, the radar. The address is printed on the title page of the printed edition.

Appendix I Frequently asked questions

Am I an employee or an intern? For the first six months you are an intern on a strict, assessment-based internship with a stipend. At six months, on the radar's evidence, you are offered a permanent position as a forward-deployed engineer at the published starting package. Section 25.

What are the hours? Ten hours plus lunch, Monday to Saturday, Sunday off, during the internship; biometric in and out or the day does not count; Wednesday stops at half past five. Nine hours minimum once permanent. Section 26.

Can I take the work phone home? No. It lives in your locker outside working hours. Customers reach the Academy, not your bedroom. Section 22.

Can I use my personal email or my own GitHub account? No. Your Academy email is your identity for every work and social account and subscription. Your public work carries your name regardless. Section 15.

Who owns what I build? Academy work is open under Apache 2.0 with your name credited. Customer work belongs to the customer. Section 12.

Will I be on camera? Yes, by default, and you may opt out of any single piece before it is cut. Section 21 and the consent form.

Can anyone see my scores? You and the core team. Team totals are public. Section 20.

What if I cannot find a customer? Your buddy and the forward-deployment lead walk into the town with you. Nobody designs without one. Section 19.

What if I break a board? Report it, sign out another, write what you learned. Hiding it is the only offence. Section 22.

What if I am ill? Tell the physician; sick leave is taken on their word without a form on the day. Section 26.

What if the pace is too much? Say so to the physician on Monday, in confidence. It costs nothing on the radar. Section 13.

What do I do on Sunday? Rest. The music rooms are open from ten to one if you want them. Section 18.

Is lunch provided? The pantry has coffee and snacks as a rescue; the building's cafeteria serves reasonably priced meals. Lunch is away from the desk. Section 22.

Can I use a free AI tool for a customer's data? No. Customer data goes only through the redaction gate to a model class that permits it. Section 14.

Someone is behaving badly. Who do I tell? The People and HR lead or any mentor, in confidence; for sexual harassment, the Internal Committee. You are protected for telling. Sections 9 and 10.

I was asked to pay someone to get a permit. What do I do? Refuse, record it, report it today. Section 11.

Can I do freelance work on the side? If declared, and if it uses none of the Academy's customers, data or confidential information and does not compete. Section 12.

What happens at sixteen weeks? Demo day, the manifestation review, your autonomy level, and the naming of vertical leads. The internship continues on product work to six months. Section 17.

What does "learn, earn and return" mean? You learn in the Loop, you earn from day one and more once permanent, and you return what you were given by mentoring the next cohort and recruiting your own team. Section 25.

Can I disagree with this docket? Yes, in writing, through the amendment process, and your disagreement is heard with you present. Section 29.