

METANODE

An AI-First Connected Learning System

Metanode is an AI-powered corporate learning platform that delivers personalised, multimodal content at scale. It provides real-time insights to help managers track engagement, align training with business goals, and continuously improve performance through data-driven analysis.

This work is supported by the Enterprise Ireland Commercialisation Fund Programme through project CF-2024-2363-I.

Who are Metanode?



Dr Keith Maycock, Programme Director and Lecturer in Computer Science in the School of Computing, in National College of Ireland, Co-Founder of Metanode and Co-founder of NetSearch Platform Limited.



Dr Michael Goldrick is an Associate Professor in National College of Ireland, Visiting Professor of Educative Technologies at Eötvös Loránd University, Research Fellow for Dublin City University. (PI) and Co-Founder of Metanode.



Donald Clark is an Entrepreneur, professor with 38 years' experience in Learning technologies, CEO, investor, Board member (PlanB learning, LearningPool and Cogbooks), He was a founding member of Epic Group plc and the Founder and CEO of Wildfire Learning.



Shudong Wang

Full Stack Developer | AI Engineer



Yinglian D.

Full Stack Developer | UI/UX Designer



Emre Kavak

Full Stack Developer | Java | SQL

Problems Identified

Existing training approaches are inefficient and ineffective:

- Despite significant investments in Learning & Development, only **12%** of workers apply training on the job, leading to an estimated **\$13.5M** in annual losses per 1,000 employees due to ineffective training [1].
- Only **29%** of employees feel fully prepared for their new role and ready to excel after onboarding [2]
- In 2025, **41%** of employees believe that training does not improve their overall job performance. [3]

Companies struggle to measure and align the effectiveness of training with business objectives:

- **60%+** of companies still struggle to effectively identify critical talent roles or align skills development with organizational goals, causing fragmentation and missed opportunities for growth, efficiency & innovation.
- Only **29%** of organisations have a defined skills taxonomy to guide workforce development.
- In 2025, research from *upgrad* shows that **75%** of employees engage in skill development only when mandated, reflecting a lack of engagement and misalignment with business objectives [4]
- Only **10%** of HR executives effectively classify and organize skills into a skills taxonomy or framework, suggesting a lack of structured processes for skills identification and development [5].

1 [1] <https://www.edstellar.com/blog/corporate-training-statistics> ; <https://www.aihr.com/blog/employee-onboarding-statistics/?utm=https://elearningdoc.com/the-hidden-costs-of-inadequate-training/>

[2] <https://www.wearehumanatwork.com/p/spotlight-feature-2025-hr-trend-2-workforce-agility-through-skills?utm=>

[3] <https://www.devlinpeck.com/content/employee-training-statistics?utm=>

[4] [5] <https://economictimes.indiatimes.com/jobs/hr-policies-trends/three-in-four-employees-only-upskill-when-mandated-says-upgrad-enterprise-report/articleshow/121334727.cms?utm=>



Unmet needs to be solved: There are thousands of Learning Management Systems (LMS) vendors across the globe in a crowded marketplace. However, these platforms lack an AI-first, ecosystem-wide integration and underpinning of effective learning theory. Due to a collective reliance on “bolting-on” AI features, many existing LMS’s still rely upon many outdated processes, or simply cannot address the following unmet needs:

- (i) The manual development of multi-modal courses and learning support resources.
- (ii) Tracking of skills and knowledge within a company’s ecosystem
- (iii) Providing real-time analytics into a company-wide project.
- (IV) Discovering hidden talent within the organization

Metanode Products

1. Automated Project planning and reporting
2. Automated course Creation and Assessment.
3. Learning Analytics and Visualization.
4. Automated Talent Management.

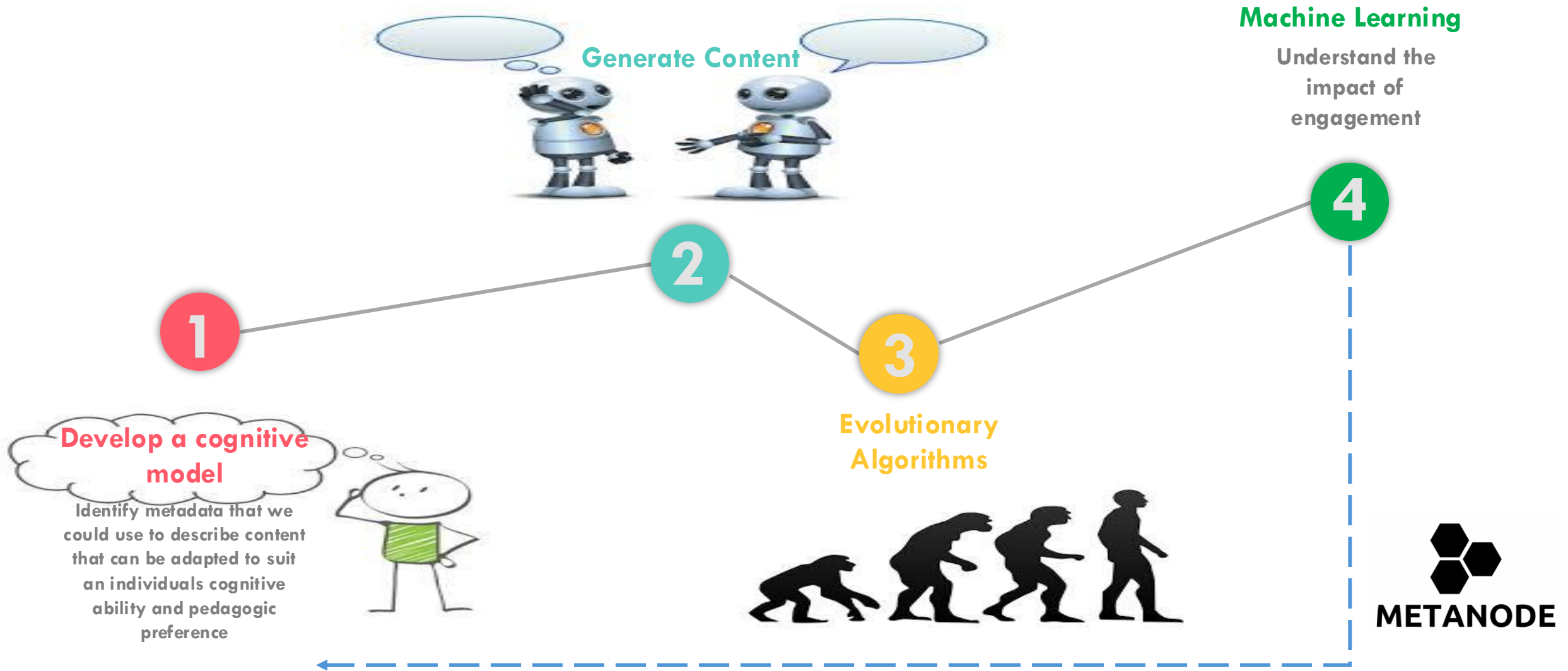
Validation of our insights:

To validate our insights the team met with a series of C-Level Executives and world leaders in L&D:

- Alfred Remmits, CEO of **Xprtise**, a performance support company (Partner)
- Mark Visser, CEO of **HiHaHo** – Interactive video platform.(Partner)
- John Geoghegan, Managing Director, **Landcorp** International Property Services LTD (Partner)
- John Ghent, CEO, **PrivacyEngine**, leading Data Privacy solution and services provider (Partner)
- Sean Kelleher, Managing Director, **Qualtec**, Learning Solutions company (Partner)
- Chris van der Kuyl, **J Studios** – best known for developing Minecraft.
- Sam Watts - Head of Content, **HTC Vive** (global VR provider).
- Wendie Edie - CEO **E-Com** - Online learning platform and VR vendor
- Stella Collins, Co-Founder of **Steller Labs**, Learning Technology Company based in Belgium.
- Niels Vildbrad (COO) and Jan Larsen, (CPO) of **Area9 Lyceum**, Adaptive Learning Company.

Resulting in a Potential Test bed Population: 60,000+

AI First Corporate Learning Ecosystem



Progress to Date



Shudong Wang

Full Stack Developer | AI Engineer



Yinglian D.

Full Stack Developer | UI/UX Designer



Emre Kavak

Full Stack Developer | Java | SQL

Automated course Creation and Assessment: Our system can create any training course or Module automatically, leveraging existing databases in collaboration with AI.

[+ NEW PROJECT](#)[Create Course](#)[Published](#)[Draft](#)

User Interface Design

Explore principles of user interface design, including layout, typography, and color theory. Learn to create...

1

🕒 25 Hours

[Edit](#)

Online Course



Python guide

Explore Python programming fundamentals, including data types, control structures, functions, and modules...

🕒 24 Hours

[Edit](#)

Manual Handling

Learn safe manual handling techniques to prevent injury. This course covers risk assessment, lifting...

🕒 8 Hours

[Edit](#)

web design

Learn the fundamentals of web design, including HTML, CSS, and UX principles. This course covers layout...

🕒 12 Hours

[Edit](#)



Course Basic Information

Course Title

Introduction to Manual Handling in Food Processing

Course Description

Throughout this course, you will learn about common hazards, risk assessment, proper lifting techniques, and the importance of ergonomics. Our goal is to ensure that you can perform your tasks safely while maintaining the highest standards of hygiene and food safety.

Course Cover Image



Upload Cover Image

Learning Outcomes

+ Add Learning Outcomes

LO1: Identify common workplace hazards related to manual handling and hygiene practices.



LO2: Understand and apply the principles of risk assessment to maintain a safe working environment.



LO3: Demonstrate proper lifting and load-handling techniques to prevent injuries.



LO4: Explain the importance of ergonomics in promoting safety and reducing strain in daily tasks.



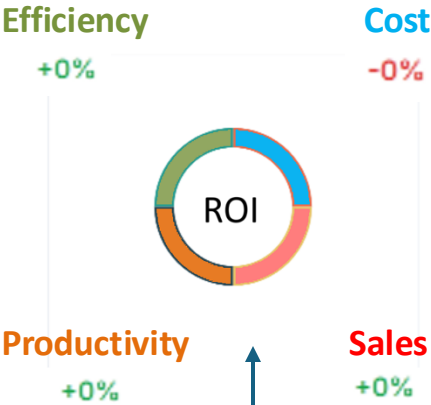
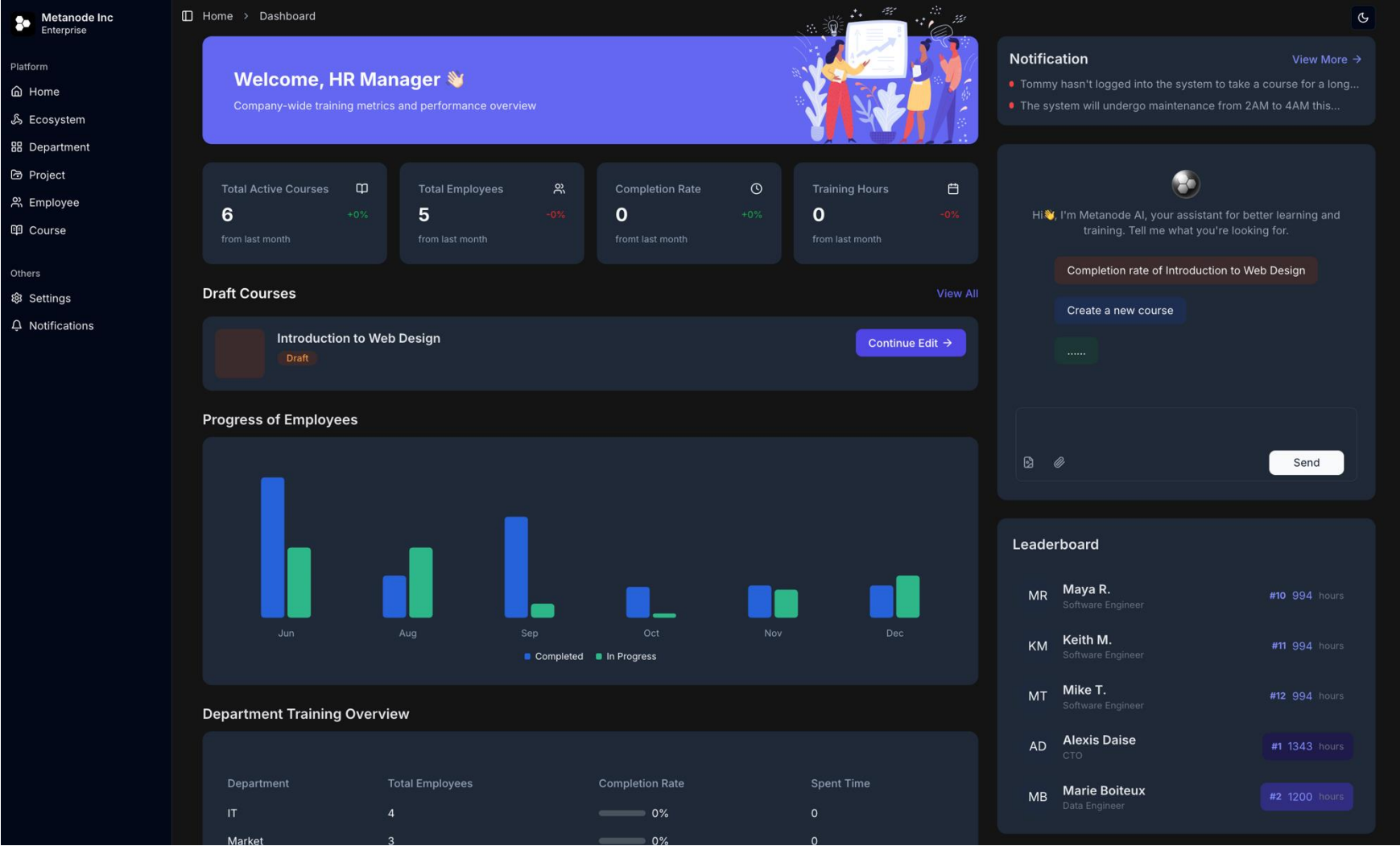
LO5: Integrate safe working practices with high standards of hygiene and food safety.



*Ergonomics;
Lifting; techniques;
Posture; Risk
assessment;
Repetitive strain;
Load management*



3. Learning Analytics and Visualization.

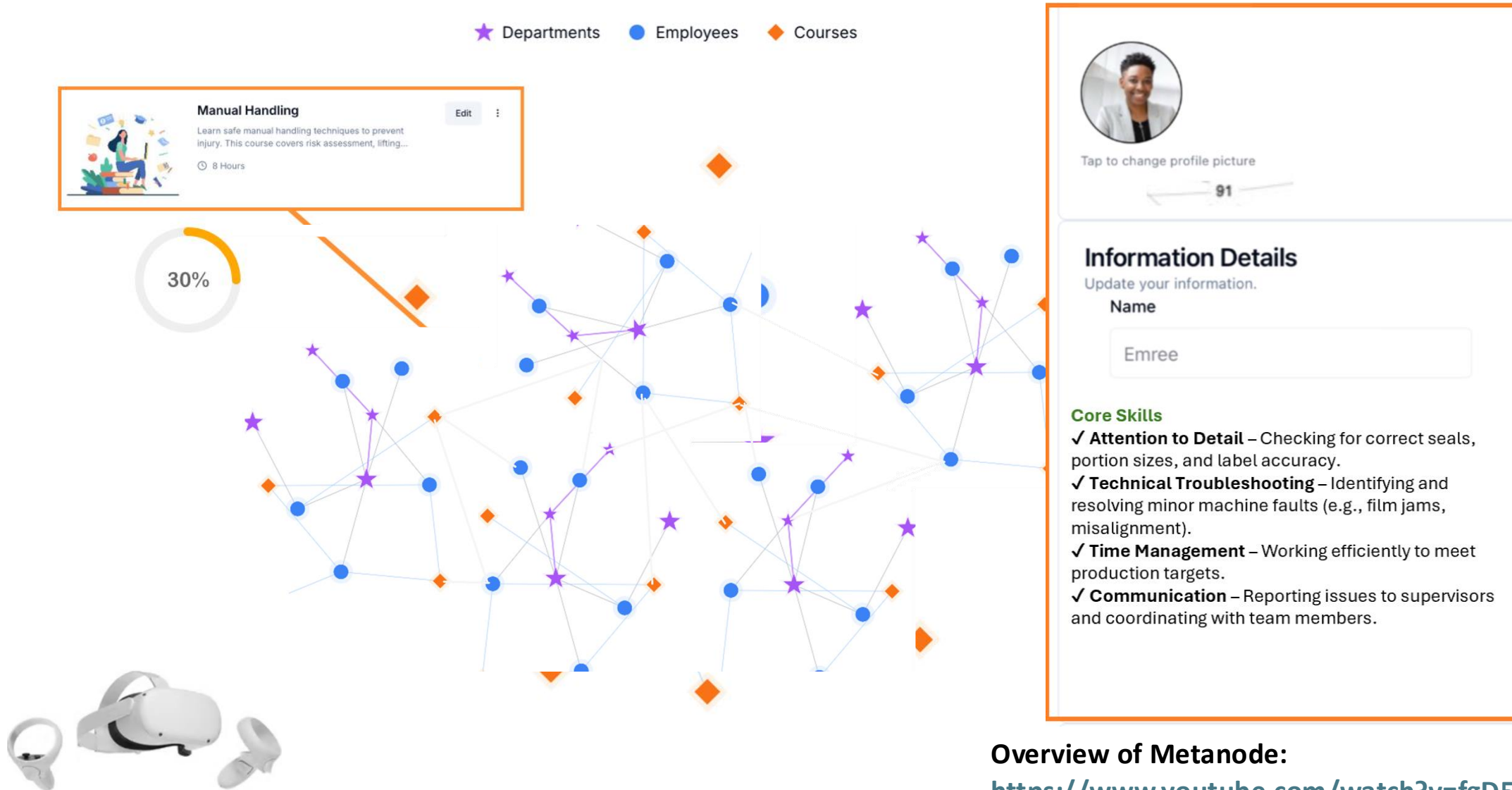


Metanode’s Enhanced Data Analysis approach is automated to show overall statistics of *progress, assessment results, engagement metrics, performance comparisons* (individuals and groups). The system will also be able to align these datasets with **your organisation objectives** to determine how effective training is in terms of **your ROI metrics**, such as **productivity, cost, efficiency, sales**.

4. Automated Talent Management.



METANODE



Overview of Metanode:

<https://www.youtube.com/watch?v=fgD5jUFxHVE>

Metanode's Enhanced visualisation With this approach, in combination with statistic data-boards, C-Level & management can easily **Identify growing talent** that can be used in new projects. This feature will also include Virtual reality compatibility.

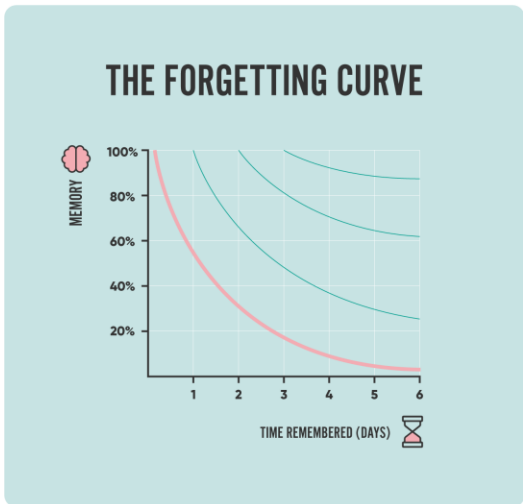
Tip 1:
“Lift Smart, Not Heavy”
 •Always use the **proper lifting technique**: Bend your knees, keep your back straight, and lift with your legs—not your back.

Overview of Mobile App:
https://www.youtube.com/watch?v=2iL5m2_WXqQ

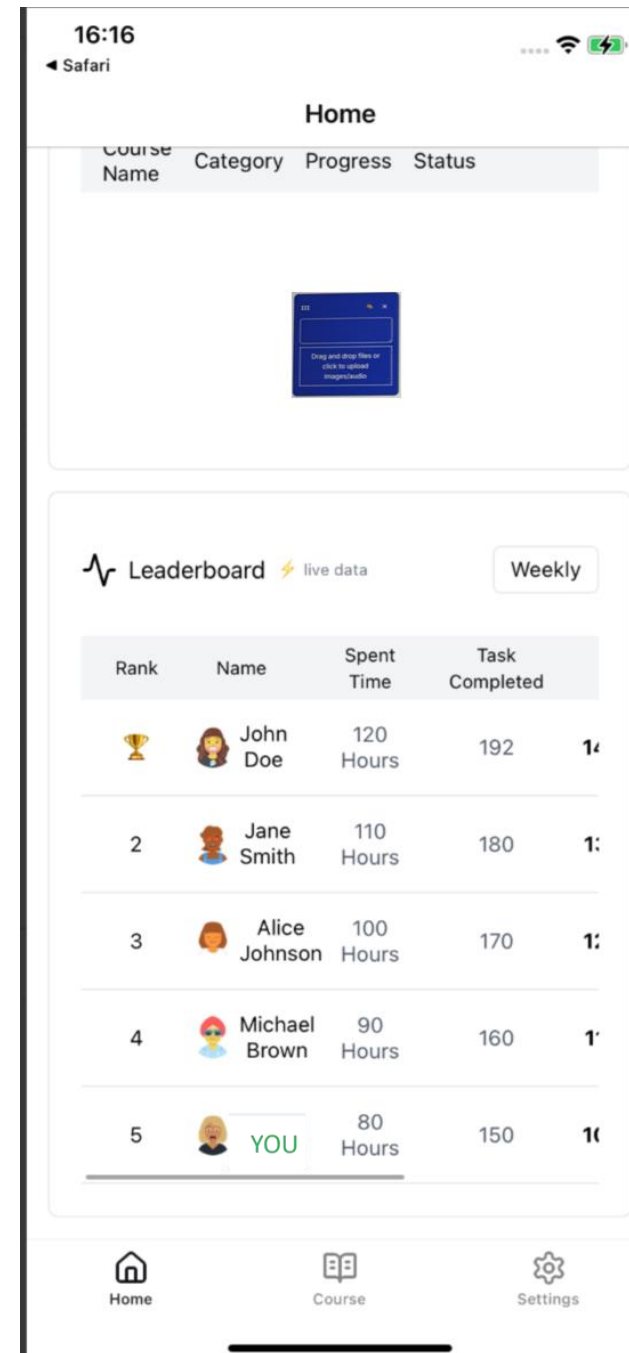
Mobile-based supports to enhance course learning

To support active learning and effectiveness, each learner can create ongoing study notes about their learning. These can act as *reminders*, or useful “*hints and tips*”. These notes can be created as either text, audio or images to help him with long-term memory recall.

Engaging in this active note-taking can significantly enhance long-term memory retention and counter the “**forgetting curve***.”



These notes are automatically included in the company’s ecosystem, and can be used to support other learners in *similar work-flow scenarios*. The Metanode system can also create leadership boards for companies who want to monitor and/or reward knowledge sharing.



1. Automated Project planning and reporting

Create New Project

Project Name

Enhance Safety 2025

Description

Our shipping unit has seen a 35% increase in injuries during shipping. Put in place a training programme to enhance awareness of manual handling procedures and ensure each member completes such with a 90% pass rate.

Monitor ongoing injury reports over the next 6 months to determine overall effectiveness of initiative.

Department

Shipping and Distribution

Team Members

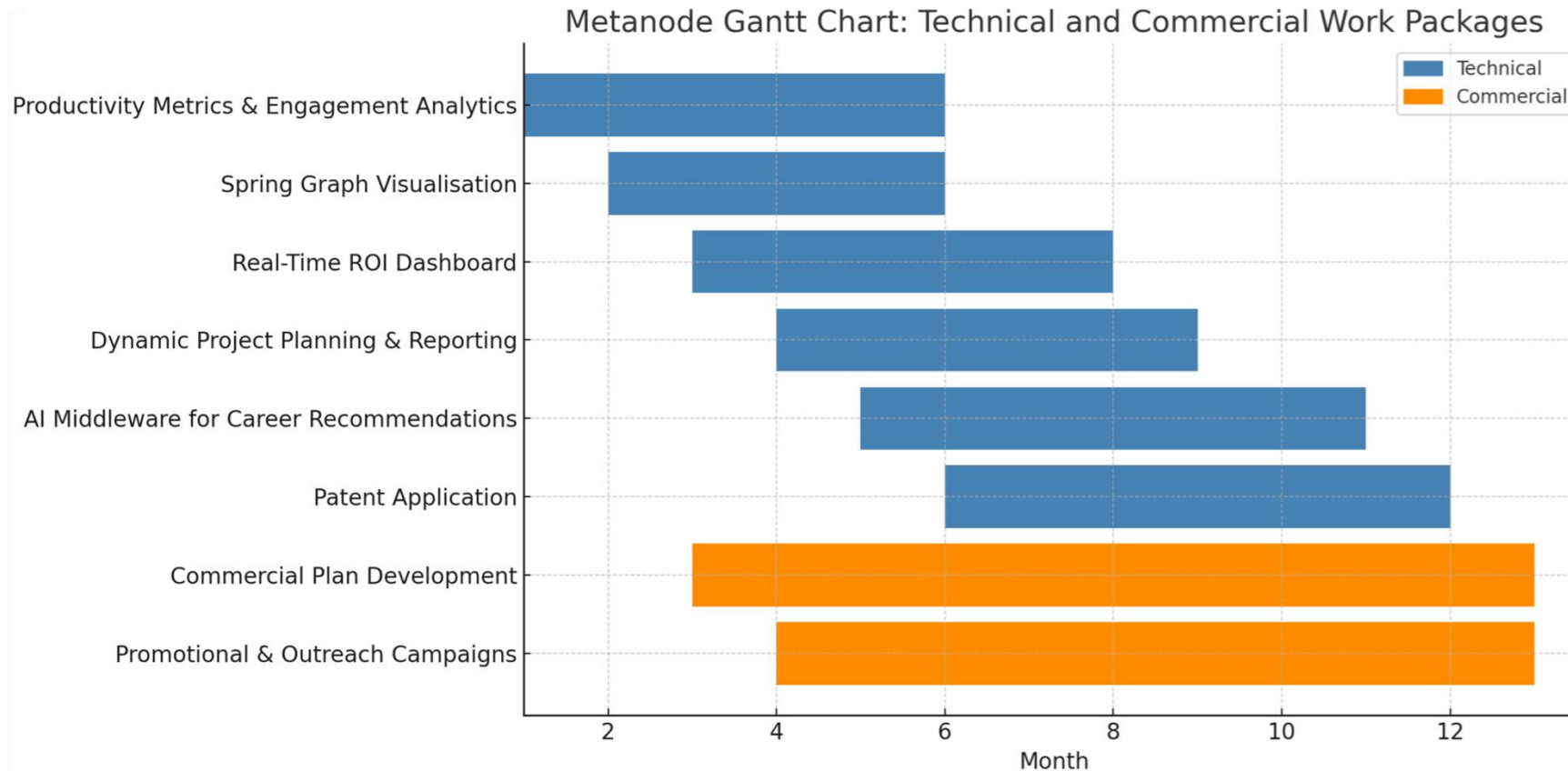
Q Search by skills...



Self-determines
whether this project
can be achieved by
the current knowledge
base in the company
ecosystem and if
there are any
additional training
requirements and/or
new hires needed.

+ NEW PROJECT

What's Next?



Obtainable / addressable market

We are targeting a total addressable market (TAM) of global corporate learning estimated to be **\$417 Billion**, in 2025. The serviceable available market (SAM), of Europe and North America, is **\$250 million** in 2025.

Our serviceable obtainable market (SOM) initially, in five years estimated to be a max of 10%, **\$25 million**.

Top-up application submitted to EI for: **€491,705** (€378,235 (Direct Costs) & €113,400 (Indirect costs)).

Metanode’s Draft Price Model



Plan	Target Business Size	Pricing (Monthly/Annual)	Key Features	Implementation & Consulting
Starter	Small Businesses (10-100 employees)	€500/month or €6,000/year	<div><div>✔</div> Course creation</div> <div><div>✔</div> Skill mapping</div> <div><div>✔</div> Employee engagement tracking</div> <div><div>✔</div> Standard learning analytics dashboards</div> <div><div>✔</div> Email support</div>	Setup: €3,000 (one-time) Optional consulting: €150/hr
Growth	Medium Businesses (100-1,000 employees)	€4,000/month or €35,000/year	<div><div>✔</div> All Starter features</div> <div><div>✔</div> Project creation and evaluation</div> <div><div>✔</div> API access for integrations</div> <div><div>✔</div> AI-driven training recommendations</div> <div><div>✔</div> Gamification module</div> <div><div>✔</div> Priority support</div>	Setup: €5,000 (one-time) Consulting package: €5,000 (includes strategy workshops)
Enterprise	Large Businesses (1,000+ employees)	Custom Pricing (€10,000+/month)	<div><div>✔</div> All Growth features</div> <div><div>✔</div> Full AI workforce analysis and talent management</div> <div><div>✔</div> Advanced security & compliance</div> <div><div>✔</div> Dedicated account manager</div> <div><div>✔</div> On-site training</div>	Setup: €10,000+ (custom) Enterprise consulting: €20,000+ (tailored supports, strategy workshops)

The LMS Pricing range for Enterprise-Level is around \$600–\$1,000 per user annually, depending on the chosen LMS platform and its features. (<https://www.edisonos.com/learning-management-system/pricing>)

Metanode's Valuation

Year	Clients (Total)	Recurring Revenue (€)	Installation Fees (€)	Consulting Fees (€)	Total Revenue (€)
Year 1	30	870,000	210,000	40,000	1,120,000
Year 2	48	1,404,000	342,000	60,000	1,806,000
Year 3	84	2,228,000	544,000	95,000	2,867,000
Year 4	114	3,342,000	816,000	140,000	4,298,000
Year 5	176	5,036,000	1,228,000	215,000	6,479,000



Estimated Valuation:

€77 million in year 5.

Developed as part of the Venture Build Programme.

Key Points:

- 1.Number of Clients increases by **60%** each year in Years 2 and 3, and **50%** in Years 4 and 5.
- 2.Revenue growth: Each year shows significant growth in recurring revenue, installation fees, and consulting fees.
3. Planned funding call for year 3 of €7 million for R&D.
- 4.The Valuation increases progressively, with a **12x** revenue multiplier applied to the Year 5 total revenue.