# Individual Reflective e-Portfolio

Github: https://va-angelier.github.io/SEPM_PCOM7E_Assignment/index.html

## Introduction and context

This individual reflective e-portfolio documents my learning journey throughout the Software Engineering Project Management (SEPM_PCOM7E) module. The portfolio serves both as a reflective narrative and as an evidence-based repository demonstrating achievement of the module's four learning outcomes through academic activities, collaborative work, and professional application extending beyond the university context.

Reflection is structured using the What? – So What? – Now What? framework proposed by Rolfe, Freshwater and Jasper (2001), as recommended within the University of Edinburgh reflection toolkit and the SEPM module guidance. This triadic structure enables systematic examination of critical incidents, their theoretical implications, and the resulting transformations in professional practice and understanding.

The central critical incident underpinning this reflection concerns my conscious decision not to assume the role of project leader during the group project. While I possess extensive professional experience spanning two decades in software engineering and governance contexts, I deliberately chose to prioritise observation, early organisational support, and analytical distance rather than formal leadership. This decision was intentional, informed by personal learning objectives to observe emergent team dynamics without compensating for structural gaps through individual effort. The consequence of this deliberate non-intervention was a lower group mark (6.4) compared to my programme average (7.4), which created a valuable opportunity for rigorous reflective analysis rather than defensive retrospection.

The group project itself focused on applying project management principles to complex software engineering challenges, drawing on topics including requirements traceability, risk management, behavioural considerations, and governance frameworks explored across Units 1–12. This portfolio critically evaluates my

individual contribution, emotional responses, learning outcomes, and professional development, while situating these reflections within established project management and teamworking theory.

Beyond the academic setting, insights developed during this module informed policy-level discussions on digital sovereignty and cloud dependency. Research conducted alongside SEPM activities contributed to a briefing for members of the Dutch House of Representatives (Tweede Kamer), demonstrating the real-world applicability of project governance concepts to public-sector software initiatives and policy-making contexts.

## Reflective Analysis (What? – So What? – Now What?)

### What?

During the early stages of the group project (Weeks 1–2), I contributed to organisational groundwork by drafting initial meeting notes, proposing structured documentation practices, and encouraging the use of shared artefacts for traceability and decision logging. These early interventions were evidenced in the Team Kick-off Meeting notes for Weeks 1 and 2, archived within the shared project repository, and in my Unit 4 wiki contribution, which documented governance frameworks for team coordination. Despite these efforts, the group did not consistently adopt formal meeting minutes or centralised decision logs beyond the initial two-week period.

My deliberate decision to refrain from assuming the formal role of project leader was grounded in two distinct rationales: first, to avoid dominating the group given my professional background and seniority; and second, to observe team dynamics and emergent leadership behaviours as part of my reflective learning objectives. I hypothesised that if I created space for organic leadership emergence, the team would establish self-governance structures out of necessity rather than deference to authority.

This hypothesis proved incorrect. As the project progressed beyond Week 3, coordination issues emerged systematically: unclear ownership of tasks across

deliverables, limited follow-up on agreed actions from meetings, and inconsistent communication channels. Team meetings occurred sporadically, but decisions were not formally documented, creating ambiguity about action items and accountability. By mid-project, the team demonstrated characteristics of persistent dysfunction: repeated discussion of the same coordination problems without resolution, decision-making by attrition rather than consensus, and reliance on informal reminder messages rather than structured trackers.

The final group mark (6.4 out of 10) reflected these coordination gaps. My individual grade fell marginally below the cohort average, representing a notable deviation from my programme average of approximately 7.4. While this outcome was disappointing, it provided concrete empirical data for reflective analysis rather than abstract retrospective justification.

At a meta-level, this reflection demonstrates a shift from viewing project management as a technical coordination problem to understanding it as a socio-organisational discipline. While earlier units positioned governance, traceability, and stakeholder management as discrete tools, this project revealed their interdependence. My failure was not a lack of knowledge, but a failure to operationalise that knowledge through visible leadership behaviours.

## So What?

The consequences of my decision not to formalise leadership aligned closely with established project management theory, though in ways I had not fully anticipated. Kerzner (2017) emphasises that effective project management requires clear authority structures, documented accountability frameworks, and transparent control mechanisms. He argues that "the absence of these structures creates diffused responsibility, where everyone assumes someone else will act, and no one ultimately does" (Kerzner, 2017, p. 45). This aligns with enterprise risk literature which identifies governance ambiguity and decision opacity as primary contributors to project risk, often outweighing technical uncertainty (Anton and Nucu, 2020). In retrospect, my reluctance to formalise leadership contributed precisely to this accountability gap, where responsibilities remained distributed rather than explicitly owned.

This dynamic aligns closely with Tuckman's (1965) seminal model of group development, which posits four stages: forming, storming, norming, and performing. Tuckman argues that groups must successfully navigate through storming—characterised by conflict, role ambiguity, and competing interests—to reach norming, where group norms, processes, and role clarity emerge. Our team appeared to oscillate between forming and storming stages without successfully progressing. Initial enthusiasm (forming) was present in the first two weeks, but as ambiguity persisted regarding task ownership and decision-making processes (storming), the team failed to establish the norming structures required for sustained performance. Critically, Tuckman notes that this transition typically requires leadership—either formal or emergent—to facilitate resolution of role ambiguity and establishment of group norms.

Lencioni's (2002) model of team dysfunction provides further contextual understanding. Lencioni identifies five critical dysfunctions: absence of trust, fear of conflict, lack of commitment, avoidance of accountability, and inattention to results. In our team, the most visible dysfunctions were the absence of healthy conflict resolution and lack of genuine commitment. What manifested as "passive agreement" in meetings—where decision options were discussed but not definitively chosen—reflected deeper dysfunction: without clear roles and authority, team

members were reluctant to advocate strongly for positions, fearing that explicit disagreement might fracture already-weak team cohesion. This passivity masked genuine disagreement and prevented the emergence of authentic commitment to chosen directions.

Emotionally, my experience of this process was complex. Initially, I experienced frustration when organisational suggestions—such as implementing weekly decision logs and assigning explicit task ownership—were acknowledged but not subsequently adopted. This frustration was compounded by the observation that my early efforts to establish governance had been tacitly welcomed by peers but not reinforced through consistent practice. However, applying reflective distance to this emotional response revealed something more analytically valuable: the frustration was not primarily about unheeded suggestions, but rather about observing predictable failure patterns emerge in real-time, recognising that I possessed both the experience and capability to intervene, and consciously choosing not to do so as a learning experiment.

This reframing transformed the experience from a personal setback into a learning opportunity. The lower mark became empirical evidence that non-intervention has consequences, that theoretical knowledge about team dynamics cannot substitute for active leadership practice, and that "leaving space for emergence" without accompanying structure is passive, not facilitative. This insight also connects directly to broader software development lifecycle (SDLC) considerations discussed in Unit 7. Bowes (2014) argues that while agile methodologies emphasise flexibility and emergent collaboration, they still require minimal formal structures to prevent decision-making from becoming implicit and undocumented. Without such structures, agility risks degrading into informality rather than responsiveness. In retrospect, our team’s behaviour reflected this risk precisely: informal coordination was mistaken for agility, while the absence of documented decisions, ownership, and traceability undermined effective execution.

## Now What?

This reflective analysis has reshaped my approach to collaborative work fundamentally. I no longer operate from the assumption that organisational structures

will emerge organically from group necessity. Instead, I now recognise that creating "space for emergence" without accompanying governance structures is not neutral—it is a form of passive leadership that tolerates preventable failure.

My revised approach comprises three concrete elements, formalised in my Professional Development Action Plan:

**First**, I will establish lightweight governance artefacts at project inception, regardless of my formal role. This includes decision registers, where all significant decisions are logged with owner assignment; weekly meeting summaries circulated within 24 hours; and explicit ownership mapping for deliverables. These artefacts require minimal overhead but create accountability and clarity.

**Second**, I will explicitly document coordination risks and escalation paths. Rather than informally compensating for gaps, I will formally record instances where structure is absent and communicate these observations to the project leadership, using Kerzner's (2017) risk management framework as the reference standard.

**Third**, I will avoid silent assumption of responsibility without explicit mandate. This is distinct from not contributing—I remain actively engaged in technical and analytical work. Rather, it means clearly distinguishing between contributions I make in assigned roles versus coordination responsibilities I might informally assume. This clarity prevents the "shadow leadership" dynamic that masks systemic governance problems.

These commitments are integrated into my formal Professional Development Action Plan and will guide future team engagements.

# Collaborative Discussion Engagement

## Unit 1 Discussion – Project Failures and Governance

In the Unit 1 collaborative forum, we examined real-world project failures using the 2023 CHAOS Report as a case study. The central discussion question was: "Why do software projects fail, and what preventive measures are most effective?" I contributed an argument grounded in governance theory: that approximately 80% of software project failures stem from management and governance deficiencies rather than technical complexity, a finding substantiated by Kerzner (2017) and the Standish Group's empirical research.

Evidence of my individual contributions to collaborative artefacts and early coordination efforts is provided in Appendix A

Specifically, I argued that teams frequently mistake individual effort for organisational maturity. A project may appear successful in the short term because individual practitioners work around governance gaps through heroic effort. However, Lencioni (2002) identifies this as a fundamental team dysfunction: the absence of healthy accountability structures creates reliance on individual initiative, which is unsustainable and masks underlying structural problems.

Peer feedback was significant. One peer noted that "informal leadership can compensate temporarily for absent processes, but creates dependency and prevents scalability." Another peer added that "formal processes feel bureaucratic until you've experienced project failure—then they feel like insurance." These observations reinforced my emerging hypothesis that governance structures, rather than being constraints on team autonomy, are enablers of team resilience.

## Unit 4 Discussion – Risk, Governance, and User-Centred Evaluation

The Unit 4 discussion centred on governance, risk management, and user-centred evaluation in software projects. I contributed by connecting software dependency risks to decision-making opacity. Specifically, I argued that when teams lack

documented decision-making processes, dependency management becomes reactive rather than proactive: critical decisions about third-party dependencies are made ad-hoc, and the rationale for those decisions is lost as team members transition or memory fades.

I referenced PMI PMBOK (PMI, 2021) risk management frameworks and ISO/IEC/IEEE 16326 (2019) standards, which both emphasise that documented decision-making and traceability are fundamental project controls. I further noted that this principle extends to governance: user-centred evaluation itself requires clear ownership, documented requirements, and transparent change management.

Peer responses highlighted the tension between process documentation and team agility. However, several peers recognised that the choice is not binary: lightweight documentation (such as decision registers or weekly summaries) provides traceability without heavyweight bureaucracy. This discussion directly informed my later reflections on the cost of governance absence and shaped my commitment to introducing minimal-but-consistent artefacts in future projects.

Collectively, these two discussions demonstrate my active engagement with module content, critical thinking applied to real-world scenarios, and willingness to interrogate my own assumptions through peer dialogue. Both discussions informed the core learning evident in this reflection.

## Evaluation of Teamworking (Unit 6)

Unit 6 focused explicitly on traceability and coordination as mechanisms for managing complexity within team environments. The unit required students to analyse how requirements flow through project lifecycles, how decisions are traced to requirements, and how coordination mechanisms ensure alignment.

In practice, our team's experience in Unit 6 illustrated both the theoretical importance of traceability and the challenges of implementing it without explicit governance. Although traceability documentation was produced, it functioned largely as a static artefact rather than as an integrated decision-support mechanism.

My contribution during this phase was primarily analytical. I supported the development of traceability documentation and identified gaps between documented requirements and emerging implementation. However, the absence of consistent governance and formal escalation paths limited the team's ability to resolve these gaps efficiently.

This experience validated a critical principle articulated in ISO/IEC/IEEE 16326 (2019): traceability is not merely a documentation exercise but a governance mechanism. When traceability documentation is produced without accompanying processes for decision-making and change management, it becomes archival rather than actionable. Effective teamworking depends less on hierarchical leadership and more on explicit process ownership and documented accountability.

This observation directly informed my Professional Development Action Plan commitment to introducing decision registers and explicit ownership mapping, recognising that such artefacts—when consistently maintained—become governance mechanisms rather than bureaucratic overhead.

## Peer Feedback

Formal peer feedback mechanisms were limited within our team structure, reflecting the broader documentation and governance challenges observed throughout the module. However, informal feedback proved instructive and informed my reflective analysis.

**Peer A** acknowledged my early organisational contributions, specifically noting that "implementing the decision log you proposed in Week 1 would have prevented many of the coordination issues we experienced later." This feedback confirmed my theoretical hypothesis about the preventive power of governance structures and validated my decision to include decision logging as a core element of my Professional Development Action Plan.

**Peer B** offered a more challenging reflection: "Your reluctance to lead meant someone else had to, but in the end, no one did." Rather than interpreting this defensively, I recognised it as validation of my core learning. Non-intervention is itself a form of leadership decision with consequences. This feedback became a turning point in my reflective analysis, moving from frustration about unheeded suggestions to recognition that withholding active coordination is a choice with tangible outcomes.

I incorporated both pieces of feedback into my action plan by committing to explicit coordination role-taking and to formal documentation of observations rather than informal problem-solving. This shift represents a significant development in my professional self-awareness.

## Professional Development and External Impact

The learning achieved through SEPM_PCOM7E extended deliberately beyond academic assessment boundaries. Research and analytical skills developed during the module—particularly in governance, risk management, and stakeholder coordination—contributed to policy-oriented work on digital sovereignty and software dependency within public-sector contexts.

Specifically, insights derived from SEPM-related analysis, combined with module frameworks, informed a briefing document delivered to members of the Dutch House of Representatives (Tweede Kamer) in December 2025. The briefing examined issues of digital sovereignty, cloud dependency, and governance risks associated with third-party software platforms in government systems. The core argument—that governance structures and documented decision-making are foundational to managing technological risk—directly paralleled principles explored throughout the SEPM module.

This external application demonstrates several important points: first, that project management principles are directly applicable to public-sector policy contexts; second, that the theoretical frameworks taught in SEPM have real-world relevance beyond software development teams; and third, that governance thinking—the central theme of my reflection—is increasingly critical to societal decision-making about technology.

This experience reinforces my commitment to applying structured project management methodologies in both academic and professional domains, and underscores the importance of rigorous reflection on professional practice.

This experience has reshaped my professional identity. Rather than positioning myself as a specialist contributor, I now recognise that senior expertise carries an implicit obligation to intervene when governance gaps emerge. This aligns with PMI's (2021) framing of leadership as accountability stewardship rather than authority. In future projects, I will interpret silence not as neutrality, but as a decision with consequences.

## Professional Development Action Plan (PDP)

Based on the critical learning evident in this reflection, my professional development priorities for the next 12 months are specifically defined using SMART (Specific, Measurable, Achievable, Relevant, Time-bound) objectives:

Specific Objective: By the end of Q2 2026 (30 June 2026), I will establish documented governance structures in all projects I lead or contribute to as a technical/analytical lead. These structures will include: (a) decision registers, where significant decisions are logged with owner assignment and rationale; (b) weekly meeting summaries circulated within 24 hours of conclusion; and (c) explicit ownership mapping for deliverables, updated at least weekly.

**Measurable Success Metrics**:

- 100% of team meetings will be documented within 24 hours of conclusion
- All decisions with project impact will be recorded in a shared decision register within 48 hours of decision

- Weekly stakeholder alignment check-ins will be scheduled as the first 30 minutes of weekly team meetings
- Ownership mapping will achieve 95%+ coverage of deliverables (no orphaned tasks)

**Achievable Implementation**: This approach is achievable using existing collaboration tools (Microsoft OneNote, SharePoint, or equivalent). The documentation overhead is minimal—approximately 30 minutes per week for meeting summary documentation—and the process scales across multiple concurrent projects.

**Relevant to Learning**: This PDP directly addresses the accountability gap I identified in my team project. It operationalises the governance principles articulated by Kerzner (2017) and PMI (2021), and aligns with ISO/IEC/IEEE 16326 standards for project management. It further embodies the team coordination principles described by Tuckman (1965) and Lencioni (2002).

**Time-bound Implementation**: The 12-month trial period (July 2026 – June 2027) will allow iterative refinement. Quarterly reviews (October 2026, January 2027, April 2027) will assess progress against metrics and permit process adjustments based on observed effectiveness.

# Learning Outcomes Mapping and Evidence

**Learning Outcome 1**: Analyse and apply appropriate software engineering and project management methodologies, tools and techniques

This outcome was central to my module engagement and is evidenced across multiple units. Through Units 3, 4, and 11, I actively engaged with formal project management frameworks, specifically Kerzner's (2017) Systems Approach to planning and controlling, and the PMI PMBOK Guide (PMI, 2021).

Evidence of this learning includes: (a) my contribution to the requirements traceability exercise (Unit 6), where I applied structured requirements analysis using traceability matrices to identify gaps between requirements and implementation; (b) my risk assessment analysis (Unit 3), where I systematically applied Kerzner's risk ranking and prioritisation methodology to categorise project risks by probability and impact; and (c) my governance analysis in Unit 11, where I evaluated project controls against ISO/IEC/IEEE 16326 standards.

Critically, I learned that methodologies are not self-implementing. Knowing best practices does not ensure their adoption; adoption requires explicit leadership commitment and reinforcement. This learning emerged painfully from my team project experience and is directly reflected in my PDP commitment to introducing governance artefacts at project inception.

**Learning Outcome 2**: Evaluate software quality and assurance techniques

Units 2, 4, 9, and 10 provided opportunities to engage with quality assurance frameworks. I contributed to Behaviour-Driven Development (BDD) implementation using the Behave framework (Unit 2), participated in code quality analysis using linting tools (Unit 10), and evaluated quality improvement opportunities in project documentation and communication patterns.

This outcome taught me that quality assurance is fundamentally a process discipline, not an individual one. Code can be technically excellent yet embedded in a project that fails due to process dysfunction. Quality thinking must extend beyond technical artefacts to encompass team coordination, communication clarity, and governance.

**Learning Outcome 3**: Apply professional tools and collaborative practices

Evidence across Units 2, 6, and 10 demonstrates engagement with professional collaboration tools, shared repositories, traceability documentation, and automated quality checks. I contributed to the development and maintenance of shared wiki documentation, supported requirements traceability exercises, and participated in code review processes.

This outcome reinforced that tools are enablers of good practice, not substitutes for it. A well-designed traceability tool still requires explicit governance to be effective; a shared wiki requires discipline in maintenance; code review processes require committed team participation.

**Learning Outcome 4**: Systematically develop and implement skills required to be an effective member of a development team in a virtual professional environment

This outcome is addressed most directly through this reflective submission, the dedicated reflective analysis, and the Professional Development Plan. The reflection itself—structured using Rolfe et al.'s (2001) framework—demonstrates critical self-assessment and evidence-based learning.

Specifically, I have developed increased self-awareness regarding the relationship between leadership, responsibility, and outcomes. I have learned to distinguish between technical contribution and coordination responsibility, and to recognise that both are required for team effectiveness. I have learned that observing team dynamics is not passive—observation combined with documented analysis constitutes a form of leadership in itself.

While all learning outcomes were addressed, LO4 (reflective professional practice) represents the most significant developmental gain. In contrast, LO3 (coordination and traceability) exposed a competence gap between analytical understanding and behavioural execution. This imbalance provides a clear developmental priority beyond the module, reinforcing the value of reflective practice as an ongoing professional discipline rather than a summative exercise.

# Conclusion

This reflective e-portfolio has documented my learning journey through SEPM_PCOM7E, centred on a critical incident: my deliberate decision not to assume formal leadership in the team project, and the consequences of that decision. Through rigorous reflection structured by Rolfe et al.'s (2001) What-So What-Now What model, supported by engagement with established project management theory (Kerzner, PMI, Tuckman, Lencioni), I have transformed initial disappointment about project outcomes into structured learning about governance, accountability, and professional practice.

Key learnings include: (1) governance structures are not optional bureaucracy but foundational to team effectiveness; (2) non-intervention is itself a leadership choice with consequences; (3) project management principles extend beyond software development to broader organisational and public-sector contexts; and (4) professional development is iterative, grounded in reflection on evidence rather than abstract aspiration.

This learning is operationalised in my Professional Development Action Plan, which commits to concrete, measurable action. I anticipate that the governance practices articulated in my PDP will significantly enhance my effectiveness in future team environments, whether in academic or professional contexts. This module has reinforced my commitment to evidence-based, theory-informed professional practice.

# Appendix A – Verifiable Evidence of Individual Contribution

**Figure A1 – Wiki contribution (Unit 4)**

Evidence of authored governance and risk analysis within the shared module wiki.

https://github.com/va-angelier/va-angelier.github.io/blob/main/SEPM_PCOM7E_Assignment/Unit_4/SEPM%5BUnit4%5D%20Module%20Wiki.pdf

**Figure A2 – Glossary and summary contribution (Unit 6)**

Individual contribution to shared terminology and conceptual clarification.

https://github.com/va-angelier/va-angelier.github.io/blob/main/SEPM_PCOM7E_Assignment/Unit_6/Wiki-Summary-Glossaries%20_%20UoEO.pdf

**Figure A3 – Team kick-off meeting notes (Week 1)**

Early organisational and coordination efforts prior to role formalisation.

https://github.com/va-angelier/va-angelier.github.io/blob/main/SEPM_PCOM7E_Assignment/Unit_6/Team%20Kick-off%20Meeting%20%E2%80%93%20Week%201.pdf

**Figure A4 – Team kick-off meeting notes (Week 2)**

Continuation of coordination efforts and early project structuring.

https://github.com/va-angelier/va-angelier.github.io/blob/main/SEPM_PCOM7E_Assignment/Unit_6/Team%20Kick-off%20Meeting%20%E2%80%93%20Week%202.pdf

**Figure A5 – Initial methodology statement**

Early governance and methodological framing prior to team execution.

https://github.com/va-angelier/va-angelier.github.io/blob/main/SEPM_PCOM7E_Assignment/Unit_6/Methodology%20statement.pdf

**Figure A6 – Collaborative discussion contribution (Unit 7)**

Peer engagement and reflective synthesis of module concepts.

https://github.com/va-angelier/va-angelier.github.io/blob/main/SEPM_PCOM7E_Assignment/Unit_7/SEPM%5BUnit%207%5D%20Summary%20Post.pdf

**Figure A7 – Collaborative Discussion 2 summary (Unit 4)**

Summary of peer interaction and learning outcomes from discussion activities.

https://github.com/va-angelier/va-angelier.github.io/blob/main/SEPM_PCOM7E_Assignment/Unit_4/Collaborative_Discussion_2_Summary.md

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