The Hong Kong Polytechnic University

Subject Description Form

Subject Code	ELC3124
Subject Title	Professional English for Data Science and Analytics Students
Credit Value	2
Level	3
Pre-requisite	LCR English subjects
Objectives	This subject aims to develop the English language skills required by students to communicate effectively in professional contexts.
Intended Learning Outcomes	Upon completion of the subject, students will be able to: a. plan, organize and produce logically-developed and convincing project reports that present data findings, interpretations, and recommendations in a professional manner, adhering to industry standards and best practices; b. construct clear, concise, and persuasive proposals that effectively communicate their data science project objectives, methodologies, and expected outcomes to a non-technical audience; and c. deliver engaging and coherent presentations that effectively convey complex data science concepts and results to diverse audiences, utilizing appropriate visual aids and communication techniques. To achieve the above outcomes, students are expected to use language and structure appropriate to the context, select information critically with Gen AI, present ideas systematically and logically, and provide support for stance and opinion.
Subject Synopsis/ Indicative Syllabus	This content is indicative. The balance of the components, and the corresponding weighting, will be based on the specific needs of the students. 1. Project reports Selecting and organizing relevant content; referring to source information for support; applying appropriate paraphrasing, summarizing and referencing skills; maintaining cohesion and coherence; referring to visuals and numerical data; achieving appropriate tone and style; using appropriate format; improving editing and proofreading skills. 2. Proposal writing Identifying and practicing writing functions in proposals; understanding and applying principles of technical text structure; selecting relevant content; achieving appropriate style and tone; using appropriate format. 3. Proposal presentation Structuring and practicing proposal presentation, designing visual aids, and mastering delivery techniques to effectively communicate project objectives, methodologies, and anticipated outcomes to stakeholders.
Teaching/Learning Methodology	The subject is designed to introduce students to the written and spoken communication skills that they may need to function effectively in their future

	professions. These skills will be necessary for successful employment in any organization where internal and/or external communication is conducted in English. The study method is primarily seminar-based. Activities include teacher input as well. Learning materials developed by the English Language Centre are used throughout this course. Additional reference materials will be recommended as required.			

Assessment Methods in Alignment with Intended Learning Outcomes

Specific assessment methods/tasks	% weighting	Intended subject learning outcomes to be assessed (Please tick as appropriate)		
		a	b	c
1. **Report writing** (Students are required to work in-class for their Report Writing Assessment in Week 13)	30%	✓		
2. **Proposal writing** a. Proposal Idea Brainstorming Consultation—10% b. Proposal Plan Group Mini Presentation with Q-A Session—30% c. Multi-modal Proposal Writing—30% (To demonstrate proposal writing process, students must submit a cap screen from ChatGPT/ other Gen AI tools, as well as the first version and revised version of the group proposal writing and their individual contribution to the project as a whole).	70%		✓	✓
Total	100 %			

Explanation of the appropriateness of the assessment methods in assessing the intended learning outcomes:

Students' writing and speaking skills are evaluated through assessment tasks related to the learning outcomes. Students are assessed on the appropriacy of the language used in fulfilling the assessment tasks, as well as the thoughtfulness, selection and organization of ideas.

Student Study Effort Required

Class contact:	
• Seminars	26 Hrs.
Other student study effort:	
• Classwork-related and project-related	52 Hrs.

	preparation and self-access work	
Total student study effort		78 Hrs.

Reading List and References	Barker, T. T. (2005). *Writing software documentation: a task-oriented approach* (2nd ed.). Longman. Cole, K. E., Inada, M., Smith, A. M., & Haaf, M. P. (2013). Implementing a Grant Proposal Writing Exercise in Undergraduate Science Courses To Incorporate Real-World Applications and Critical Analysis of Current Literature. *Journal of Chemical Education, 90*(10), 1316–1319. https://doi.org/10.1021/ed400130s Dawson, C. W. (2000). *The essence of computing projects: A student's guide*. Prentice Hall, Pearson Education Ltd. Friedland, A. J., Folt, C. L., & Mercer, J. L. (2018). *Writing Successful Science Proposals* (3rd ed.). Yale University Press. Houp, K. W., Pearsall, T. E., Tebeaux, E. & Dragga, S. (2006). *Reporting technical information* (11th ed.). Oxford University Press. Johnson-Sheehan, R. (2008). *Writing proposals* (2nd ed.). Pearson. Northey, M., & Jewinski, J. (2016). *Making sense: a student's guide to research and writing: engineering and the technical sciences* (5th ed). Oxford University Press. Reep, D. C. (2010). *Technical Writing: Principles, strategies and readings* (8th ed.). Pearson. Silyn-Roberts, H. (2013). *Writing for science and engineering papers, presentations and reports* (2nd ed.). Elsevier.