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| Student Name | Douglas Mearns |
| Company | TTE Systems |
| Research University | Leicester |
| Academic Supervisor (s) | Dr Michael Pont |
| Title | Developing a novel programming language for use in time-triggered embedded systems. |
| Abstract | <p>In the field of embedded systems, "C" is - by far - the most popular programming language. However, this language has a number of areas where the behaviour of a section of code can be classified as undefined or implementation defined, leading to potentially major issues in terms of portability, reliability, and timing that are especially significant when developing safety-critical systems. This project aims to examine the C language, how programmers interact with it, and then define a subset of the language for use with time-triggered system architectures. The tools necessary to use this subset of the language are to be developed for use in TTE systems' RapidITTy toolset.</p> |