

JCE Digital Ltd specialises in the application of digital electronic engineering to industrial control and instrumentation systems. With many years of experience, our design experts have a detailed knowledge of the issues related to the production of electronics robust and reliable enough to deal with the demands of industrial environments.

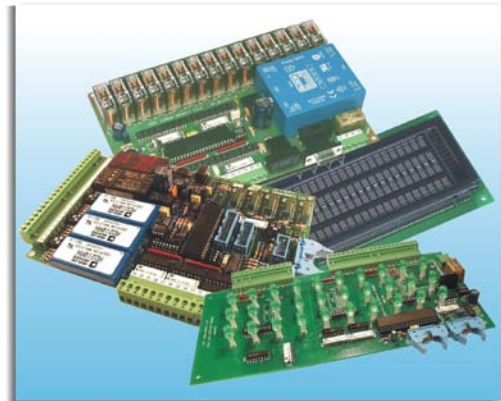
● Our Own Range of PCBs

We have produced our own range of embedded control and instrumentation PCBs. Most of the PCBs have been designed to take advantage of the great flexibility which can be achieved through the use of software controlled, microprocessor based, digital electronics.

An inter-PCB communications data-highway has also been developed to allow the boards to be combined in a modular fashion and built into larger scale control systems.

These boards are frequently made use of in systems custom designed to client specifications.

It is often the case that solutions built using our own PCBs allow us to offer sophisticated facilities, which if implemented by other means, would push our clients system over budget. Please see the products section for further details.



● Custom Designed Electronics

We also offer a Custom Designed Electronics service to our clients. In the past this service has been provided at two different levels. Firstly, we can take a pre-defined client design, and carry out the engineering required to produce a finished device. Alternatively, in conjunction with our R&D activities, we can take a project all the way from client concept, through full development cycle, to a production run of finished PCBs.

Our areas of electronic engineering expertise include:-

- Microprocessor based control and instrumentation systems
- Isolation, segregation, shielding, and EMC issues connected with MCUs
- High reliability, robust, electronic design specifically for industrial environments
- Annunciation / user interface electronic design

Our PCB design services include:-

- Schematic capture
- Bill of materials production
- Component analysis (specification, cost, MTBF, etc.)
- Full documentation
- PCB layout (complex PCB shapes, surface mount or through-hole, etc.)
- PCB routing (multi-layer PCBs, track analysis, etc.)
- Tightly controlled interface with raw PCB manufacturer
- PCB population
- PCB circuit testing
- PCB function testing
- Support & Service