

# Software Developer (KTP Associate)

Department	Electronic and Electrical Engineering ( <a href="http://www.strath.ac.uk/engineering/electronicselectricalengineering/">www.strath.ac.uk/engineering/electronicselectricalengineering/</a> )		
Faculty	Faculty of Engineering ( <a href="http://www.strath.ac.uk/engineering/">www.strath.ac.uk/engineering/</a> )		
Staff Category	Knowledge Transfer Partnership	Reference No	290108
Reports To	Robert Atkinson (Academic Supervisor) David Williams (Industrial Supervisor)	Grade:	RS79
Salary Range:	Up to £40,000 per annum plus £5k training and development budget	Contract Type:	Fixed Term (30 months)
FTE	1	Closing Date	24/03/2020

## Job Advert

The Department of Electronic and Electrical Engineering in partnership with Spartan Solutions ([www.spartansolutions.com](http://www.spartansolutions.com)) is seeking to appoint a Knowledge Transfer Partnership (KTP) Associate in the area of data analysis/processing with a focus on tool chain development for machine learning.

Spartan Solutions Ltd is a software company specialising in solutions for the equipment rental, industrial services, construction and major infrastructure and the oil and gas markets. Spartan is a fast-growing software company building Digital Operations and Predictive Maintenance products to improve asset performance in a global marketplace. Like the 300 Spartans, they have teams of passionate, reliable and pragmatic professionals who do what it takes to get the job done.

The Spartans are looking for a passionate software engineer to drive the automation and productionisation of ML pipelines for industrial informatics. The successful candidate will have the opportunity to develop their technical, leadership and communication skills to help Spartan grow their business.

Based in their Glasgow office, you will report directly to Dr David Williams, Chief Technology Officer.

The post is concerned with the implementation of a cascading pipeline of software tools to automate the process of data preparation for machine learning algorithms. The technologies developed will interface with the company's new data analytics platform, PROPHESE.

You will be employed by the University of Strathclyde but will spend most of your working time at the company's premises in Glasgow. Optionally, there will be an opportunity to register a PhD with the University.

To be considered for the role you will be proficient in software engineering with a bachelor's degree in computing science or similar. Practical experience of programming in industry would be advantageous. Excellent interpersonal and communication skills are essential along with the ability to listen, engage and persuade, and to present complex information in an accessible way to a range of audiences.

This position includes extensive management training with a generous personal development budget (£5k) and the opportunity to develop both industry and research skills for your future career. You will be the project lead, managing your own workload and ensuring outputs whilst having continuous support from your academic and company supervisors.

The project is part of the Knowledge Transfer Partnership (KTP) programme that aims to help businesses to improve their competitiveness and productivity through the better use of knowledge, technology and skills that reside within the UK knowledge base. Successful Knowledge Transfer Partnership projects are funded by UK Research and Innovation through Innovate UK and are part of the government's Industrial Strategy. To find out how KTP works and the vital role you will play if you successfully secure a KTP Associate position please visit: [www.ktpws.org.uk](http://www.ktpws.org.uk).

# Job Description

## Brief Outline of Job:

Supported by the academic team at the University of Strathclyde and the software solutions team at Spartan Solutions, the KTP Associate will deliver a suite of tools aimed at automating the pipeline processes that support machine learning methodologies.

## Main Activities/Responsibilities:

1.	Software implementation of a data processing tool chain to permit automation of data cleansing, outlier detection, feature scaling, and reshaping tasks.
2.	Documentation of solutions developed to a professional standard.
3.	Liaison with the industrial sponsor to ensure alignment with business strategy, and with other developers to ensure alignment with other solution produced by the sponsor.
4.	Acting as a conduit to transfer knowledge from academia to industry.
5.	Formulate project plans for delivery milestones.
6.	Plan and manage workload with guidance from colleagues as required.
7.	Support business needs of product through end-customer engagement.
8.	Engage in continuous professional development both within the university and industrial sponsor.

# Person Specification

## Educational and/or Professional Qualifications

(E=Essential, i.e. a candidate must meet all essential criteria to be considered for selection, D=Desirable)

E1 BEng / MSc in Computing Science or related discipline

D1 PhD in Computing Science or related discipline

## Experience

E2 Excellent programming skills

D2 Background knowledge of machine learning

D3 Experience of software design processes

D4 Hands on experience of the Python programming language

D5 Hands on experience of C#/Java or other strongly-typed language

## Job Related Skills and Achievements

E3 Excellent interpersonal and communication skills, with the ability to listen, engage and persuade, and to present complex information in an accessible way to a range of audiences.

D6 Excellent time / project management skills.

D7 Strong mathematical/analytical skills

D8 Ability to build strategic business cases and construct commercial arguments

## Personal Attributes

E4 Strong interpersonal skills

E5 Ability to work independently, as well as part of a team.

E6 Able to engage with a range of internal and external stakeholders at a range of different levels

E7 Ability to prioritise multiple tasks and meet deadlines

D9 Proficient in technical writing and presentations.

## Application Procedure

Applicants are required to complete an application form including the name of three referees who will be contacted before interview without further permission, unless you indicate that you would prefer otherwise. Applicants should also submit a Curriculum Vitae and a covering letter detailing the knowledge, skills and experience you think make you the right candidate for the job. Applicants should also complete the Equal Opportunities Monitoring Form.

## Other Information

Further information on the application process and working at Strathclyde can be found on our website (<http://www.strath.ac.uk/hr/workforus>).

Informal enquiries about the post can be directed to Dr Robert Atkinson, Senior Lecturer ([robert.atkinson@strath.ac.uk](mailto:robert.atkinson@strath.ac.uk), 0141 548 2879).

### Conditions of Employment

Conditions of employment relating to the KTP staff category can be found at: [Conditions of Employment](#).

### Rewards and Benefits

Our staff have access to a wide range of outstanding benefits that include financial rewards, family friendly and wellbeing benefits and career development opportunities, details of which can be found [here](#).

### Probation

Where applicable, the successful applicant will be required to serve a 6 month probationary period.

### Pension

The successful applicant will be eligible to join the Universities' Superannuation Scheme. Further information regarding this scheme is available from [Payroll and Pensions](#).

### Interviews

Formal interviews for this post will be held on 01 April 2020.

### Equality and Diversity

We value diversity and welcome applications from all sections of the community.

The University currently holds a Bronze Athena SWAN award, recognising our commitment to advancing women's careers in science, technology, engineering, maths and medicine (STEMM) employment in academia.

### University Values

The University's Values capture what we're all about: who we are, what we believe in and what we stand for. [Our Values](#) have been derived from how we act and how we expect to be treated as part of Strathclyde.

