# Online Department Developers – The Portal Test



#### **The Recruitment Process**

The recruitment and selection process for Developers at TJ Morris is completed in a number of stages. For the first stage you are required to build a solution (described below). If successful, you will be invited to attend interview at our Head Office in Liverpool.

### **Objectives**

The solution we ask you to build allows us to see a sample of code and gives us an insight to how you would approach the problem and coding skills. We call building this application 'The Portal Test', named affectionately after the street our Head Office is located.

Whilst the solution can be solved quite easily, this is your opportunity to showcase your skills and experience.

You are required to create a PHP, Javascript or GO based solution.

#### **Requirements of the Portal Test**

When writing your solution you should write a command line utility which can be used to help streamline the picking process for a fictional warehouse.

Given an input file with the below 3 columns in CSV format:

- product\_code
- quantity
- pick location

Find the optimal route through the warehouse. There are 52 bays in the warehouse lettered from A to AZ, each bay has 10 shelves for stock numbered from 1 to 10 (1 being lowest shelf, 10 being highest). For the purpose of this test the warehouse racking is in a long straight line and the items need to be picked in ascending order, i.e. starting at bay A and finishing at bay AZ, each of the items should be picked from lowest to highest shelf (1-10).

#### Format of the Application

The output of the utility should be a CSV file, containing the sorted products for the pick run. The CSV file should be formatted in the same way as the input file with the same column headers. The file should only contain a single row per product with quantities summed.

Embellish upon your solution as you wish but do not use a framework.

## **Submitting your Application**

We ask that candidates submit their test back within one week either to the individual whom you received the test or our Resourcing Team; <a href="mailto:carina.lewis@tjmorris.co.uk">carina.lewis@tjmorris.co.uk</a>. If you feel that you are not able to keep to this timescale for whatever reason, please contact us using the above email address as soon as reasonably practical to discuss. Once completed, you should include your surname and the date of submission in the following format: <a href="mailto:surname-yyyymmdd.zip">surname-yyyymmdd.zip</a>. e.g. <a href="mailto:Morris-20170429.zip">Morris-20170429.zip</a>

Although we endeavour to review your submission as quickly as possible, we aim to respond to you within 5 working days of submission.