**Measuring Efficiency**

You need to be able to learn and use efficiency ratios to help you draw conclusions on the performance of an organisation.

The ratios that you need to learn are:

### Trade Receivable Days

\[
\text{Trade Receivable Days} = \frac{\text{Trade Receivables}}{\text{Credit Sales}} \times 365
\]

This ratio shows how long on average people who the organisation has given credit to (debtors) are taking to pay. The shorter this figure typically the better the organisation is performing as it is collecting in its debts quickly. This figure should be compared to the stated credit period that is given.

### Trade Payable Days

\[
\text{Trade Payable Days} = \frac{\text{Trade Payables}}{\text{Credit Purchases}} \times 365
\]

This ratio shows how long on average the organisation is taking to pay the people who have given it credit (creditors). There is a belief that this figure needs to be greater than the receivables days and as long as possible. This could mean the organisation is holding on to money for a greater period of time, thus getting any rewards from this.

### Inventory Turnover

\[
\text{Inventory Turnover} = \frac{\text{Average Inventory}}{\text{Cost of Sales}} \times 365
\]

This ratio shows on average how long is stock being held by an organisation. Typically it is viewed as a lower figure is better as a greater stock turnover means more sales must be taking place. However this does very much vary depending on the type of product that is being sold.

**NB:** Average inventory is calculated by: \((\text{Opening Inventory} + \text{Closing Inventory}) / 2\)
Supermarket Sweep

You are going to conduct some efficiency ratio analysis on 4 different well known UK supermarkets. All of the financial information that you will need will be included in the annual reports.

You can find the annual reports for each of these organisations in the F3 section of this page: http://www.beebusinessbee.co.uk/index.php/business-qualifications/btec-nationals-business-level-3/btec-nationals-2016

You should focus your ratios on **one year** for each organisation and keep this the same for all organisations once selected.

You should use this information to complete the table below.

**Chosen Year:**

<table>
<thead>
<tr>
<th>Organisation</th>
<th>Trade Receivable Days</th>
<th>Trade Payable Days</th>
<th>Inventory Turnover</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tesco</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Sainsbury’s</td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>Morrison’s</td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Marks and Spencer</td>
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<td></td>
<td></td>
</tr>
</tbody>
</table>

Now that you have completed this ratio analysis.

**Evaluate in your option which supermarket is performing the best when focusing on financial efficiency?**