Shares and Dividends

The ownership of a limited company is divided into shares. A shareholder is a person who owns some of the shares. The value of their holding is the number of share they hold, multiplied by the share price. Every year (or sometimes more often) the company pays dividends to shareholders. The size of the dividend depends on the company’s performance, and how much reinvestment they are making.

Example

<table>
<thead>
<tr>
<th>Share Prices</th>
<th>Today’s Price</th>
<th>% Change (from yesterday)</th>
<th>Maximum Price (last 12 months)</th>
<th>Minimum Price (last 12 months)</th>
</tr>
</thead>
<tbody>
<tr>
<td>ABC Ltd</td>
<td>13.72</td>
<td>1.7%</td>
<td>16.41</td>
<td>12.53</td>
</tr>
<tr>
<td>DEF Plc</td>
<td>21.50</td>
<td>0.3%</td>
<td>24.19</td>
<td>18</td>
</tr>
<tr>
<td>XYZ Co</td>
<td>67</td>
<td>-6%</td>
<td>93.40</td>
<td>62.30</td>
</tr>
</tbody>
</table>

(i) Ms Smith owns 500 shares in ABC Ltd, 220 shares in DEF Plc and 315 shares in XYZ Co. What is the value of her share portfolio today?

We work out the value of each part, and then find the total:

ABC Ltd: 500 x 13.72 = 6860
DEF Plc: 220 x 21.50 = 4730
XYZ Co: 315 x 67 = 21105

The total value of her portfolio is therefore £32,695.

(ii) Mr Jones owns 20 ABC Ltd shares and 37 XYZ Co shares. What was the value of his portfolio yesterday?

First we will work out yesterday’s share prices for each of these shares. From the table, we can see that today’s ABC Ltd share price is a 1.7% change from yesterday’s. Therefore, £13.72 is 101.7% of yesterday’s price. We calculate yesterday’s price as follows: 13.72 / 101.7% = £13.49

Similarly, yesterday’s XYZ Co share prices is 67 / 94% = £71.28

Therefore the value of Mr Jones’ portfolio yesterday was

20 x 13.49 + 37 x 71.28 = £2,907.16

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In the following example, the companies pay an interim dividend as well as a final dividend. We have that the total dividend paid per share per year is the sum of the interim dividend and the final dividend

Total annual dividend = Interim dividend + Final dividend

**Example**

<table>
<thead>
<tr>
<th>Dividend paid per share</th>
<th>ABC Ltd</th>
<th>DEF Plc</th>
<th>XYZ Co</th>
</tr>
</thead>
<tbody>
<tr>
<td>Interim Dividend</td>
<td>0.97</td>
<td>0.51</td>
<td>0.52</td>
</tr>
<tr>
<td>Final Dividend</td>
<td>1.70</td>
<td>1.14</td>
<td>1.76</td>
</tr>
</tbody>
</table>

(i) What is the total annual dividend paid to someone who holds 1250 DEF Plc shares?

The total dividend paid annually per share is $0.51 + 1.14 = £1.65$

Then the total annual dividend paid is $1.65 \times 1250 = £2,062.50$

(ii) This year's final dividend for XYZ Co is a 10% decrease on last year's final dividend. Last year's interim dividend is unchanged. What is the difference in value of a 250 XYZ Co share dividend payment between last year and this year?

First we work out this year's total dividend payment per share $0.52 + 1.76 = £2.28$

Therefore the total dividend payment for this year is $250 \times 2.28 = £570$

Next we calculate last year's final dividend. We know that £1.76 is a 10% decrease on last year's final dividend, therefore we have that £1.76 is 90% of last year's figure. Then we calculate $1.76 / 90\% = £1.96$

Therefore last year's total dividend payment per share was $1.96 + 0.52 = £2.48$

Then the total dividend payment for last year was $250 \times 2.48 = £620$

Finally, the difference between last year and this year is $620 - 570 = £50$, that is, a decrease of £50.

**Speed Tip!**

Since the interim dividend remains unchanged, it would be sufficient to calculate the change in final dividend payment

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