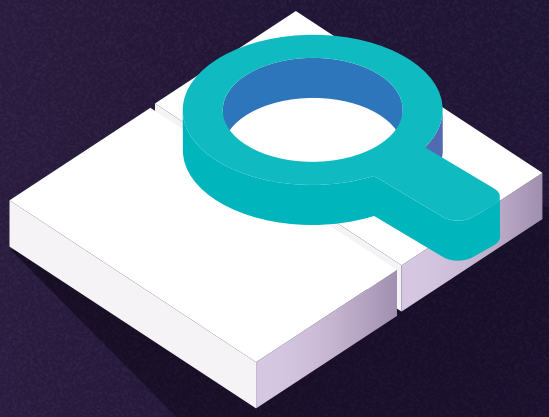
Making the most of working capital



This paper looks at how working capital figures are calculated, the interaction between the different elements and what practical steps you can take to improve your business' working capital procedures and practices.

Who's in charge of working capital?

Working capital management is the sole responsibility of the finance department – isn't it?

Not really. For any business to maximise its overall efficiency so suppliers and, perhaps most importantly, employees are paid on time, it's vital that the sales department, procurement and inventory teams all know how the terms of trade they agree will affect their business' working capital.

But what does "working capital management" actually mean? Simply put, working capital management makes sure a company has enough cash flow to meet its short-term obligations and operating expenses.

See how the numbers stack up

The 2016 European Working Capital survey by REL Consultancy suggested that the Top 1000 corporates across the EU had excess cash tied up in working capital of €981bn. Of this, Receivables accounted for €304bn, Payables, €349bn and Inventory €328bn.

Of course there's an element of double counting here, as one company's receivables are another company's payables, but even so the total figure accounted for 6.7% of European GDP in 2015.

The survey found that 2015 was not a bad year for working capital performance, with net working capital improving relative to revenue growth. But it also flags that few companies have focused steadily on improving their working capital management - only 13.2% of those surveyed managed to sustain improvement in their cash conversion cycle for three years in a row.

Companies face ongoing uncertainty surrounding Brexit and there is no guarantee that interest rates will remain low. These factors may mean the coming months are a particularly

opportune time for businesses to reduce borrowing and concentrate on generating cash through tighter working capital management.

There's a difference between releasing working capital in the business and working capital optimisation. Working capital optimisation is more about ensuring an effective financial supply chain is in place, whereas simply

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releasing working capital from reviewing inefficient practices is only a temporary fix if those practices remain in place.

So what is working capital?

Working Capital is usually defined as the excess of current assets over current liabilities and is calculated as **Current Assets minus Current Liabilities** in the balance sheet. If Current Assets are more than Current Liabilities, this is a surplus figure and, if less, a negative figure.

So what is a "good" figure? This largely depends on the industry type and the terms of trade. It's normal for certain sectors, for example construction, to have to agree long payment terms from debtors, and so current assets will typically outstrip current liabilities. On the other hand, a big retailer that sells goods on a cash basis, but can take advantage of credit terms from their suppliers would see current liabilities outstripping current assets.

Whatever trade terms apply to a sector, all companies need to manage their current assets and current liabilities effectively so that they don't have excessive or sub-optimal working capital tied up in the business.

So far so good, but what does that mean in real terms for the business? If there are more current liabilities than assets, the shortfall has to be funded either by short term borrowing, which can be costly, or managing debtors, creditors and stock more effectively.

Running the numbers

It's important to understand how working capital figures are arrived at. So let's start with how the figures for Days Payables Outstanding (DPO), Days Sales Outstanding (DSO) and Days Inventory Outstanding (DIO) outstanding are calculated.

Once we've done this, we can calculate the Cash Conversion Cycle and understand what those figures are telling us about the business.

DPO

You can calculate this by dividing the outstanding Trade Creditors by the total Cost of Goods Sold (COGS) multiplied by 365 (days in the year) and this will show the average number of days it takes the company to pay its trade creditors.

$$\frac{\text{Trade Creditors}}{\text{COGS}} \times 365 = \text{DPO}$$

The figure is also a check on the trade terms agreed with the supplier. For example, if settlement is after 60 days but the DPO figure is 40 days, the company is paying its creditors too early. This means it will need more working capital, which will be an additional cost for the company, even if it is only an opportunity cost.

Similarly, if the figure is 80 days, payments to suppliers are being delayed. This may at first glance seem a good thing as it's keeping cash in the business, but it could be storing up potential problems with late payments. These could include the cost of delays being factored into the price and potentially the company getting a bad reputation for being late payers.

DSO

You can calculate this by dividing the Total Debtors by Sales, again multiplied by 365.

$$\frac{\text{Debtors}}{\text{COGS}} \times 365 = \text{DPO}$$

As with the DPO figure above, what trade terms apply to sales? This depends on a number of factors including the sector the company operates in but again, if trade terms are 30 days, this calculation will help show if there is any slippage in collection.

Delays in receiving sales receipts will mean that a company needs more working capital than expected so there will be an additional cost to the business.

DIO

You can calculate this by dividing Total Inventory/stock by COGS, multiplied by 365.

$$\frac{\text{Inventory}}{\text{COGS}} \times 365 = \text{DPO}$$

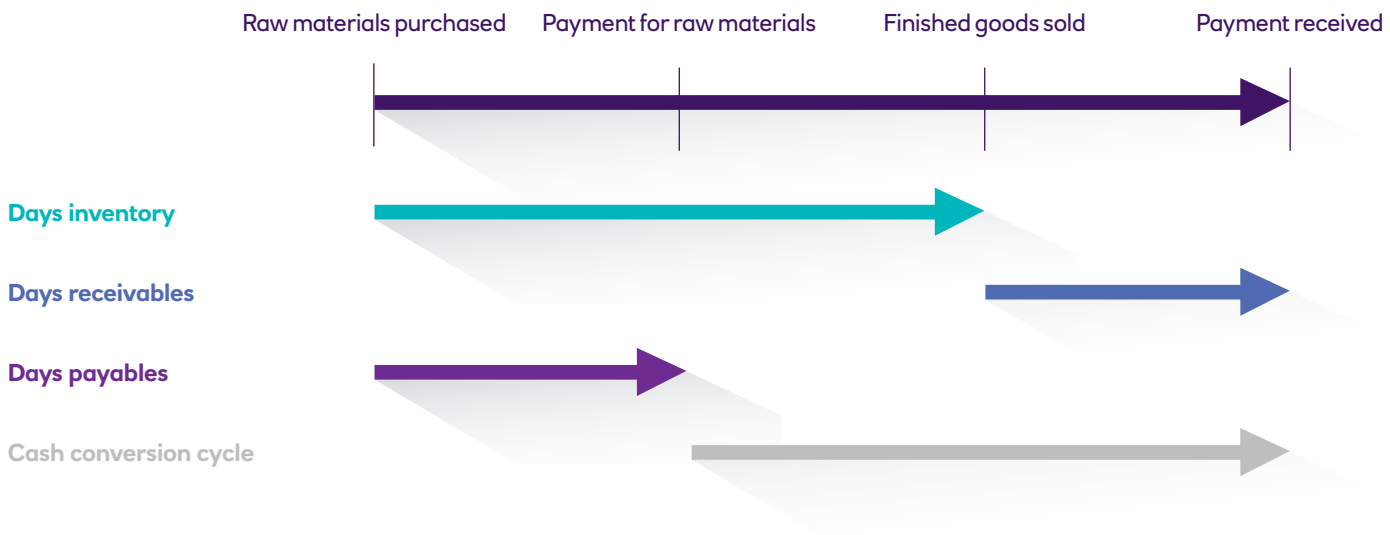
This figure will identify if the inventory level in the business is enough for budgeted sales. Too much inventory and there's a danger that it will become obsolete or slow moving; too little stock and the business may not be able to fulfil orders, leading to loss of business.

Many businesses have introduced "just in time" practices to make sure that inventory levels are always sufficient for the business. This of course calls for close liaison between the sales, manufacturing and warehousing parts of the business – not always that easy. The finance department also need to be involved so they can forecast cash flow and manage working capital efficiently.

Cash Conversion Cycle (CCC)

Now that we have the above calculations, the CCC can be calculated. This will help a business understand how many days of working capital it needs to have available. The CCC can best be described as the relationship between current assets and liabilities and their impact on a company's liquidity. It's calculated by adding DSO and DIO and then subtracting DPO.

Figure 1 – Cash Conversion Cycle



The operating cycle, consisting of funds tied up in debtors and inventory, is offset by funds provided by unpaid creditors. This is shown in **Figure 1**.

What it means for your business

The best way to demonstrate the importance of managing trade debtors, creditors and stock levels is to take a fictional example (let's call it WCM Widgets) using the figures below and calculated using the formulae above:

	£million
Annual Sales	50
COGS	42
Debtors	12
Inventory	10
Trade Creditors	15

Using these figures we can calculate the DSO, DIO and DPO figures for WCM Widgets:

DSO

$$\frac{\text{GBP 12 (Debtors)}}{\text{GBP 50 (Total Sales)}} \times 365 = 87.6 \text{ days}$$

DIO

$$\frac{\text{GBP 10 (Inventory)}}{\text{GBP 15 (Trade Creditors)}} \times 365 = 86.9 \text{ days}$$

DPO

$$\frac{\text{GBP 12 (Debtors)}}{\text{GBP 42 (COGS)}} \times 365 = 130.4 \text{ days}$$

So the CCC is:

87.6 (DSO) + 86.9 (DIO) – 130.4 (DPO) = 44.1 days

This means that the business has cash invested in its operating cycle for an average of 44.1 days. So it needs enough liquidity (cash or short term borrowing facilities) to be able to cover 44 days of operation. In this example, it adds up to approximately GPB 6m. Whether these figures are good or bad depends on the type of business WCM Widgets is, and a comparison to competitors in this sector.

The 2016 REL Consultancy Working Capital report (referred to earlier) also details the median performance across various industry sectors. It provides a useful comparison for any business to see how it compares against these figures.

The above calculations show that reducing debtors, decreasing inventory and increasing creditors will release cash into the business. And that is why it's important to understand how to calculate the figures and what they mean to the health of the business.

Figure 2 – Managing Working Capital and available liquidity

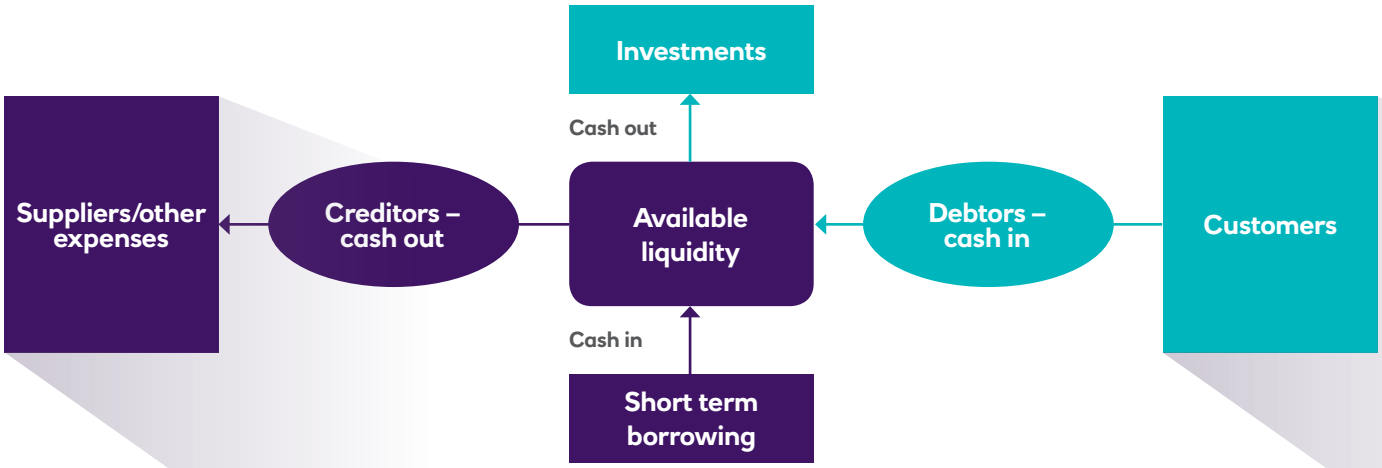


Figure 2 shows the importance of managing working capital, including short term borrowing facilities, so that the business doesn't run out of liquidity.

How it all adds up

So far we've looked at how the figures are calculated, but how can better management of the assets and liabilities of the business improve liquidity?

Let's take the numbers under the CCC example above and assume that terms of trade for sales should be 60 days, which would suggest that WCM Widgets has a problem with collecting debtors.

Outstanding debtors are GBP 12m, which represents an average collection time of 87.6 days. If the company was able to collect funds within the terms of trade (60 days), outstanding debtors should be:

$$\frac{\text{GBP 50m (total sales)}}{365} \times 60 = \text{GBP 8.22m}$$

This means that WCM Widgets is in effect giving over 27 days credit on average to its debtors. This is having a negative impact on working capital, as total debtors should be GBP 3.78m lower.

If our fictional business were to make sure that sales terms of trade were met, the CCC in this example would be reduced by over 27 days; calculated as 60 (DSO) + 86.9 (DIO) – 130.4 (DPO) = 16.5; compared to 44.1 days as shown above.

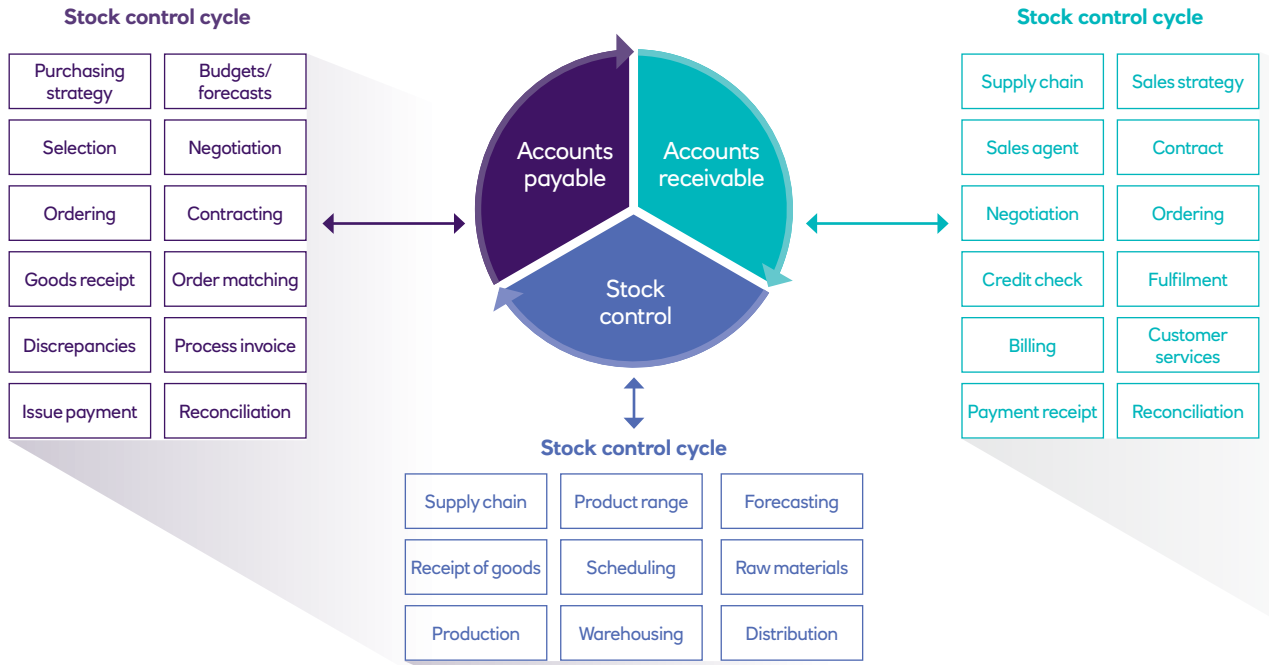
This would result in WCM Widgets reducing the liquidity it needs to support the business from 44.1 days to 16.5 days.

In monetary terms, this is approximately GPB 2.25m, a significant improvement over the current figure of GBP 6m. In turn, this could reduce financial pressure on the business, improve its financial management reputation and potentially increase business.

If this sum can be released from working capital, it could be used to reduce debt or be invested if it was surplus cash. Either way, the cost to the business is real. If WCM Widgets was borrowing at 5%, the working capital needed could cost GBP 189,000 in interest on an annual basis.

Providing there is no pressure on the availability of short term funding to the business, the cash released could alternatively be used to reduce creditor days. This could improve supplier relationships and be used as a lever to negotiate lower pricing. Of course a Cost Benefit Analysis would be needed to work out the best course of action for the business.

Figure 3 – The interaction between Inventory management, Debtors and Creditors



Let's look beyond the balance sheet

It's not simply a case of managing the figures in isolation. As already seen, the CCC is made up of three figures; DSO, DPO and DIO; but what internal business factors and processes affect the actual numbers at any one time? For example; how is inventory managed, is the sales team measured against sales targets only, and how are sales invoices raised?

The internal processes that result in Creditors, Debtors and Inventory can be separately described as the Purchase to Pay (P2P), Order to Cash (O2C) and Inventory Management cycles.

Figure 3 above shows the interaction between these processes, which of course add complexity into the management of working capital.

Let's look at an example of a situation that could adversely affect the amount of working capital available. A company (we'll call it ABC Systems) is negotiating a contract with a new client for a significant order, amounting to GBP 5m. Naturally, the sales team is keen to get the additional business.

To get the contract signed, the sales team agree to payment after 90 days and confirms that delivery will be made within 14 days. The normal terms of trade for the business is 60 days and sales team have assumed inventory is readily available. But in fact it isn't, so an urgent order has to be placed with another supplier at a higher price.

So the implications for ABC Systems to consider include:

1. It's had to spend more to get the inventory needed to meet the order. This will reduce the profitability of the contract.
2. There may be additional manufacturing and cost incurred to get the finished product.
3. The additional cost of extending credit terms by 30 days and assuming cost of funds at 5%, can be calculated as GBP 5m x 30 / 365 x 5% = GBP 20,547
4. Will the business have enough working capital to meet the shortfall created by the extended sales terms?

As you can see from the interaction between the various business functions shown in Figure 3, there are several areas that could lead to working capital issues. For this reason, every business needs to have procedures and processes in place to manage all of the potential areas of conflict.

Going back to the example of ABC Systems above, were the sales team aware of the potential issues this contract could cause? If procedures were in place, they could have spoken to the warehouse to check that sufficient finished goods were available, and asked the finance team whether the contract would be beneficial from a financial perspective

Quick tips and things to think about

Clearly, understanding and managing working capital is vital to the continuing success of any business – the old adage that "Cash is King" is as true today as it has ever been. But what practical measures can a company take to make sure working capital is optimally managed? (It's usually the existing practices that haven't changed over time that need to be reviewed to see if they still meet the needs of the business and today's economic environment.)

Here are some useful tips that every business can employ – and of course many do.

- Implement robust trading procedures within the company, monitored against Key Performance Indicators. Engage all operations within the business to make sure these KPIs are understood. Get management to agree to incentivise staff to stick to them as part of their annual performance targets.
- Manage your supply chain effectively.
- Meet the terms of trade agreed for both suppliers and customers – don't delay payments or chase collections just to improve the working capital figures. Your suppliers may think that there is a financial issue and might raise prices, look to improve the trade terms in their favour or, even worse, decide not to supply the business anymore. In addition, your customers may demand better pricing for paying earlier than agreed. In both cases, this can negatively affect the profit margins of a business, which in turn could have a negative impact on overall business performance.
- Make sure invoices/statements are issued promptly. Include your preferred method of payment and your bank account details (BIC and IBAN/BBAN) so that payments can be made to you electronically. Find out the timings of your customers payment runs – if they make a payment run at the end of the month and your invoice/statement is not received in time, it may not be paid until the end of the following month.
- Where possible, do not accept foreign currency cheques in payment unless an account is held in the currency centre and the cheque is received in that location. Receiving a USD cheque in London payable in New York is an additional cost that should be avoided.
- Don't allow debtors to become overdue before identifying and resolving disputes. Keep an aged debtors record and make sure that anything unusual is raised as early as possible.
- Take and give trade discounts only when they make economic sense. There is, of course, a formula to calculate the value of a discount:

  Discount / 100 – Discount x 365 / Net Days – Discount Days

  As an example, let's say you're offered a 2% discount to pay in 10 days rather than 30 on an invoice of GBP 100,000. Using the formula above, this calculates as:

  2 / 100 – 2 x 365 / 30 – 10 = 0.3724, or 37.24% – so if you have the liquidity available or can borrow more cheaply than 37.24% it's to your advantage to take the discount.
- Introduce cash flow forecasting methodologies incorporating information from all parts of the business – sales, marketing, production and distribution. For example, is the business seasonal, or is a marketing campaign planned?
- Use internal treasury systems (typically referred to as Treasury Management Systems), such as Sage, to help gather and manage working capital information. Big businesses often use a common platform across all areas, typically referred to as Enterprise Resource Planning systems, such as SAP.
- Make sure you have a full understanding of your working capital requirements when you meet your bank. You're more likely to get the facilities you need if you understand, monitor and control the financial information, rather than approaching them on an ad hoc basis.

Next steps

This paper has outlined the importance of managing working capital and the implications for a business if there are not agreed, effective procedures in place.

Of course, there is no "one-size fits all" approach to working capital management. What's your relative strength against your suppliers/customers? Are there standard practices in your sector? And how do you compare against your competitors?

Working capital management is important for every company – and we can help you to understand your particular working capital needs. Depending on what they are, we offer a range of services, from simple overdrafts and debtor discounting facilities, to more complex finance packages to support your import and export activity.

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