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Time Management in the Digital Age

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The Importance of Time Management

Time management is one of the biggest challenges of the 21st century. If you ask a friend “how are you?”, a common response is “I’m busy”. While time management has always been an issue, it’s a particular problem in the digital age, for a number of reasons:

- Work often has no clear end. In the past, there was a clear stopping point – a certain number of cows to be milked, or fields to be ploughed. Nowadays, you can always find a way to improve a Powerpoint presentation, or a further scenario to model into your Excel spreadsheet.¹
- Work can be done almost anywhere. Email, video conferencing, and remote connection to your office computer aim to free you from having to be physically present in your office. But this is at the cost of forcing you to be mentally present in your office, even when you’re on holiday.
- Emails mean that it’s very easy to be burdened by requests. Now, complete strangers can send requests to hundreds of people at once. In the past, they’d have to type up – or even hand-write! – a letter, put a stamp on it, and take it to a post box. In the office, a colleague would have to telephone you or speak to you in person. Given the time cost, she’d ensure that you’re the correct person before doing so. Now, she can send a “mass outreach” email to several people, without checking if they’re all relevant – particularly if she’s senior.
- There are a huge amount of distractions from email, social media, news etc., meaning it is difficult to do focused work.

There are many excellent books on time management which I’ve learned a substantial amount from. However, not all of them are tailored towards the 21st century, and thus the unique challenges described above. Moreover, some of them sound sensible in theory, but are difficult to put into practice when the rubber hits the road on Monday morning. Stephen Covey’s *7 Habits of Highly Effective People*² is my favourite business book of all time and I’ll draw heavily from it here. However, some have said that the idea of focusing on the “important” and not the “urgent” just isn’t practical – you need to satisfy urgent client requests else you’ll go out of business. The goal of this talk is to adapt, extend, and complement classic time management frameworks for the digital age.

It may seem strange for a Professor of Finance to give a lecture series on “Business Skills in the 21st Century”. I don’t have a PhD in Time Management, nor Public Speaking or any of the other subjects in this series. However, because I knew that I needed to improve in these subjects, I started studying them extensively – some as many as 16 years ago – and in particular focusing on what the research shows. Moreover, having worked in investment banking and now juggling several different responsibilities (research, teaching, my Gresham series, policy and media work, editorial duties etc.) I’ve had to road-test these ideas and adapt them for the digital age. In addition, one of my specialisations is behavioural economics / behavioural finance, which offers guidelines on how to make good habits (e.g. time management) stick.

¹ Allen, David (2001): *Getting Things Done*

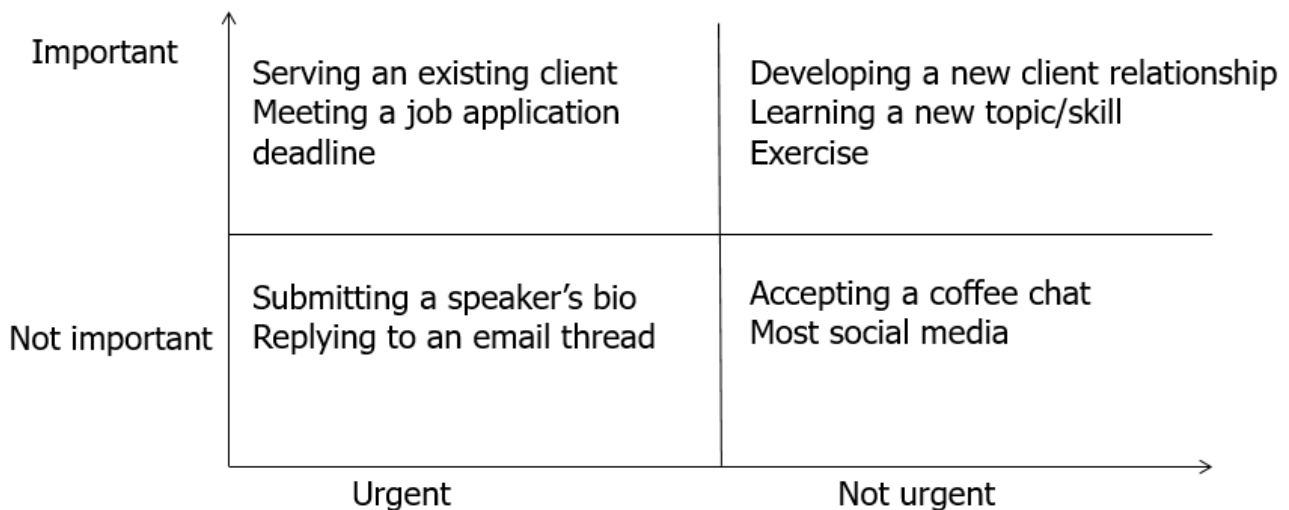
² Covey, Stephen R. (1989): *7 Habits of Highly Effective People*



Focus on the Important ...

Traditional time management involves writing a “To Do” list. Out of that list, how do we decide what to do first? One approach is captured by the Covey framework I alluded to earlier. Under this approach, people start with *urgent* tasks first – the ones with the most pressing deadlines. That seems to make sense, since deadlines need to be met. Indeed, it’s the time management technique engrained in us since school days – we’d do homework due tomorrow before homework due next week (and anyone starting homework a week early would be seen as a swot). A second approach (not in Covey) is to start with the *easy* tasks first – the low-hanging fruit, which takes less time to complete. This is tempting because it’s addictive to tick items off your to do list – you get a dopamine hit each time you do so.

Both approaches are *efficient*. Under the first approach, you hit every deadline. Under the second approach, you may end up crossing 19 things off your 20-item “To Do” list by the end of the day – seemingly a 95% success rate. But neither is *effective*. The first approach is ineffective since life would be empty if it was just about meeting other people’s deadlines. Instead, life is primarily about doing what *you* want to do. The second approach is ineffective since the one task out of 20, that you failed to do, was actually the most important item. Covey thus suggests stratifying tasks not based on their urgency but their *importance*:



Meeting urgent tasks isn’t so difficult. Even in our immature teenage years, we could meet a homework deadline by cramming the night before. The real challenge of time management is prioritising the important activities. They should be the first items we tackle on our “To Do” lists – even if they are not urgent, and even if they are high-hanging fruit.

This all sounds logical, but how do you define “important”? Covey suggests writing a “Personal Mission Statement” about what you wish to achieve in your life. Just as you’d never set off on a journey without knowing your destination, you can’t think about time management without knowing your goals. The idea of a “Personal Mission Statement” is indeed helpful, but such statements are often defined in values or principles, such as “I will always tell the truth”, “I will never break a commitment”, or “I will use my talents to serve others”. These are often too high-level to guide day-to-day time management decisions.

An alternative, and more actionable, framework is to define “important” as things that you *want to do* rather than things that you *have to do*. The latter are *externally-imposed* tasks. If you don’t do them, someone else will bring it to your attention – e.g. meeting a work deadline, paying the rent. The former are *internally-driven* tasks which no-one will bring to your attention if you fail to do them. Examples might be (in a work setting) to read up on artificial intelligence (AI) and the opportunities it presents for your business, or (in a non-work setting) to learn the guitar or to do a triathlon next year. If you fail to do them, there will be no external consequences. But the internal consequences will be much more severe, since these are things that you really wanted to do.



To apply this framework each day, Covey suggests that you start the day by defining your “Wildly Important Goal”. This is the one task that you want to accomplish that day – if you didn’t accomplish it, you’d consider the day a failure no matter how many other tasks you achieve. Note that he recommends prioritising *one* task, not two or three. Many of us like to think we can multi-task, but that’s unrealistic without sacrificing quality. Choose *one* task – which is why he uses the seemingly strong adjective “Wildly”. Some days, you might be productive and get two or three done. But the first priority is to ensure that you get that one done.

Covey suggests starting your day with the Wildly Important Goal. You focus single-mindedly on it, ignoring other distractions. Only once you’ve completed it should you turn your attention to the rest of your “To Do” list.

... But Don’t Lose Sight of the Urgent

The above sounds all well and good. However, many practitioners have told me that it’s difficult to execute in the 21st century. The problems are similar to the academic research on business strategy. Early research viewed a CEO as formulating a strategy which she then executed. Indeed, a CEO is often perceived as an ivory-tower strategist, designing a master plan. But research by Henry Mintzberg and others showed that CEOs spend most of their time reacting rather than planning; strategy formulation and execution are intertwined. Similarly, it’s tempting to think that time management is simply about designing a plan and then executing it – all you need is enough willpower and discipline in execution. But the 21st century isn’t like that. Some urgent tasks are truly urgent and we can’t cheerfully ignore them in blissful pursuit of the important. You might start working on your important task at 9am, but something unexpectedly lands on your desk at 10am – after you’ve devised your plan for the day – and demands to be resolved by that evening. To go back to Covey’s “journey” analogy, weather or road conditions can knock you off course. It would be unwise to insist on sticking with your initial destination rather than changing it.

So, the key to time management is this: how to focus on the important, without losing sight of the urgent?

For this, an efficient email filing system is critical. You may start the day working on your important task (let’s say reading up on AI). An email comes in at 10am which requires action that day. One approach would be to leave it in your Inbox and continue to focus on AI. There are at least two problems with this. First, the urgent item in your Inbox distracts you. It’s hard for you to focus on AI when you know you have this urgent task that must be done today. In a famous study, participants were given a bowl of chocolate chip cookies and a bowl of radishes. Some were allowed to eat the cookies; others were only allowed to eat radishes. All participants then had to solve some problems, and those who were only allowed to eat radishes did significantly worse: they had used up so much willpower in resisting the cookies that they had little left to solve the problems.³ This phenomenon is known as “ego depletion” – you have a limited pool of mental resources, and exercising self-control reduces the resources available for other uses. In their book *Scarcity*, economist Sendhil Mullainathan and psychologist Eldar Shafir call the management of ego depletion “bandwidth management” rather than “time management”.⁴ Second, you’ll get lots of other emails during the day. Once you’ve finished your AI reading, the urgent email is buried among lots of other tasks and you may forget about it.

The solution is to create a subfolder called Today. Any email which needs to be responded to that day, you can file into that subfolder. Once it’s out of sight, it’s out of mind, and doesn’t tax your bandwidth. You can go back to reading about AI without the email in your inbox – but also with the reassurance that it’s in your Today folder, so you won’t forget about it. Then, when you’ve finished your reading, you then go to your Today folder and attend to all the urgent items that you need to do today.

³ Baumeister, Roy E., Ellen Bratslavsky, Mark Muraven, and Dianne M. Tice (1998): “Ego Depletion: Is the Active Self a Limited Resource?” *Journal of Personality and Social Psychology* 74, 1252-1265.

⁴ Mullainathan, Sendhil and Eldar Shafir (2012): *Scarcity: Why Having Too Little Means So Much*



So, over the course of the day, you do both the important and urgent tasks. But the order is critical. An alternative approach would be to start the day with all the urgent tasks, and then turn your hand to the AI reading. The idea is that you first clear your desk and then can focus on AI undistracted. However, there are two flaws with this approach. First, if you complete an urgent task in the morning (e.g. sending an analysis to a client), they will almost certainly come back with questions in the afternoon which also need to be responded to that day. Second, after completing all the urgent tasks, you will likely be tired. In the mid-afternoon, you might not bother to do the AI reading. It's not urgent, so if you don't do it today, there won't be any immediate consequences – it's tempting to put it off until tomorrow. In contrast, you can use the fact that the urgent tasks have deadlines to your advantage. Even if you're tired after completing your important tasks, you will still be energised to finish the urgent tasks due to the deadline.

Of course, the concept of the Today folder is flexible and should be tailored to your circumstances. I also have a "This Week" folder, with items that I need to complete by the end of the week, and I start going through this on Friday. Some people may work in faster-paced jobs and not have the luxury of waiting until the end of the day. They may need a "This Morning" folder. But this still buys you a precious (say) 2 hours until 11am to focus on the important tasks, which you wouldn't otherwise have if you started with the urgent.

Dealing with Email

A McKinsey study found that the average interaction worker spends 28% of his day reading and responding to email.⁵ This is likely a significant underestimate of the true cost of email for several reasons.

First, interrupting a task to check email and then resuming the task leads to major inefficiencies, because it takes a while to get back into the swing of things. A study found that it takes 23 minutes and 15 seconds to resume a task after interrupting it (and that workers stay on a task for only 3 minutes and 5 seconds). Other research documented "attention residue": if you switch from Task A to Task B, part of your attention is still thinking about Task A.⁶ Thus, rather than checking email each time a new one is received, it's much more efficient to "batch-process" email. Close Outlook, and potentially put on an internet blocker for a finite set of time (I use Freedom). Once the time is up, you can then check email and deal with several all in one go. Note that it's better to put the internet blocker on for a finite amount of time (say half an hour), rather than keeping it on as long as it takes for you to complete your current task. Tasks often take much longer than you think, and the mind focuses better when there's a clear end point. If you're 25 minutes in and craving distraction, but know that the internet blocker will expire in 5 minutes, most people can hold out for those extra 5 minutes. If you're taking a 30-minute spinning class and there's 5 minutes left, you'll push yourself until the end. But if your personal trainer asked you to ride an exercise bike until she says stop, you'll put in far less effort.

Second, constant checking of email causes addiction and makes it difficult to focus even during "work" time. Checking email is similar to gambling. At slot machines, you usually lose money. But people get addicted to slot machines since there's the rare possibility of a jackpot. Similarly, most emails are undesirable – a boss or client asking you to do a task. But we're addicted to email because, once in a while we hit the jackpot – an email conveying good news, or from a friend we'd lost contact with. Thus, incessantly checking email makes us more addicted to "gambling" and requires us to keep feeding our habit, rather than being able to concentrate. I know of people who can't even go to the toilet without using their phone at the same time, or have a drink or dinner with friends without constantly checking email. They think they're saving the odd few seconds by dealing with email when the conversation gets boring, but this is far outweighed by the effect on their brains. Studies have shown that a constant craving for distraction changes the neuroplasticity of the brain – certain neural pathways form and others get closed down, which means that the same people find it difficult to focus when they get down

⁵ McKinsey Global Institute (2012): *The Social Economy: Unlocking Productivity and Value Through Social Technologies*

⁶ Leroy, Sophie (2009): "Why Is It So Hard To Do My Work? The Challenge of Attention Residue When Switching Between Work Tasks." *Organizational Behavior and Human Decision Processes* 109, 168-181.



to actually doing work.⁷ When you do a plank, you build up your core muscles which allow you to hold the plank for longer. Similarly, when you concentrate, you build up your mental “muscle” which allows you to concentrate for longer. Neurologically, focusing triggers myelination: the connections between neurons form thicker myelin sheaths, allowing them to fire signals more effectively.

One solution is to take email completely off your phone. This might seem an unrealistic solution, because email is so essential to 21st century life. Yet I did this several years ago and have had no adverse consequences. But doesn't this mean that emails pile up – don't I end up wasting time on a subway ride when I could use it to deal with several emails? No. Because I still have email on my iPad, and so can deal with email when commuting or between meetings. The crux is that I can't suddenly whip out my iPad if I'm having a drink and the conversation turns to a topic I'm not interested in, whereas I could with my iPhone. Having email only on my iPad and not my iPhone prevents me from “mindless” email checking while still allowing me to check email during downtime. If you can't go without email on your phone, at least remove the buzz when you get a new email, and the notification “badge” which tells you how many emails are unread. If you go on your phone to use Google Maps, but see that there's 5 unread emails, this begs you to check email – to see if you've won the lottery.

I've similarly deleted Twitter and LinkedIn from my iPhone. I use these platforms for professional purposes, but I was also wasting a lot of time on them – again, I still have them on my iPad. A pilot involves trying something new for a short period and, if it works, making it permanent. For time management, we should think of a “reverse pilot” – delete some apps, say no to some requests, for a short period to see if there are any adverse consequences. If not, we can make it permanent. I used to think that I needed email, Twitter, and LinkedIn on my phone but my reverse pilot showed me that I didn't.

Don't Be Part of the Problem ...

Email isn't a natural disaster – it's a man-made disaster. Emails come from people, including you, and certainly including me. Many emails I send cause a “negative externality” – impose a time cost on the recipient because she needs to reply. I'm thus trying to “internalise” this externality – to take into account the cost that I'm imposing on the recipient when I send email.

One type of unnecessary email is one which asks for information that I can find out myself. Most people know of the “spoof” website “Let me Google that for you” (www.lmgty.com), which answers an unnecessary question by showing the sender how he could have typed it into the Google search bar and found the solution – yet they still send many emails where the answer is available online. I often receive emails asking for information that's freely available on my website. Similarly, I used to send emails even though I knew the recipient had answered the question in a prior email thread, but rather than spending one minute looking through my inbox, I took the easy option of emailing the recipient (and thus imposing a cost on her).

A second type of unnecessary email is one that's incomplete. That not only imposes a cost on the recipient, but imposes a cost on *me* because it means that the recipient needs to ask a clarifying question (given the incompleteness) and I need to reply to her email. Indeed, when I'm on vacation, I fear coming back to my hotel at the end of the day to check my email, thinking I'll be flooded. But in fact I receive far fewer emails than I thought. I realised that's because I'm part of the problem – many of the emails I receive are in response to unnecessary emails that I've sent. When you send an email, try to give all the information the recipient needs so no follow-up is required. Using a tennis analogy, try to hit a winner. If you just get the ball back over the net, the recipient will return it and force you to take another shot.

⁷ Ophir, Eyal, Clifford Nass, and Anthony D. Wagner (2009): “Cognitive Control in Media Multitaskers.” *Proceedings of the National Academy of Sciences* 106, 15583-15587. Firth, Joseph, John Torous, Brendon Stubbs, Josh A. Firth, Genevieve Z. Steiner, Lee Smith, Mario Alvarez-Jimenez, John Gleeson, Davy Vancampfort, Christopher J. Armitage, and Jerome Sarris (2019): “The “Online Brain”: How the Internet May Be Changing Our Cognition.” *World Psychiatry* 18, 119-129.



Here's an example using an actual email I received. This is not to pick on the specific sender, but to give example of how we can make emails more complete:

“I was wondering if you had a spare moment to chat about a high profile event that I am organising in January”

There are several issues with that email. First, it is not clear what date in January the event is taking place at. It would have taken the sender a split-second more to have written January 2 or January 22, but not doing so caused me to send a reply asking for the date, and for the sender to have to respond to that email. Second, it is not clear what the event is about. If it's about Finance, then I might indeed be able to help. If it's about Fine Arts, then I won't. Again, this requires me to ask for a clarification. Third, it's not clear what the sender wants from me. Does she want me to speak at the event (in which case I would also need to know its location)? Or does she want my advice on which speakers to invite? The subject line of the email, “Some Advice”, also did not help.

... But Be Part of the Solution

Time management in general, and good email practices in particular, are very difficult to improve by ourselves – it's a community effort. In addition to not being part of the problem by sending unnecessary email, we can proactively be part of the solution. First, by being fully focused and not checking email in a group setting, we encourage others to do so also. We create a “hub” of focus – similar to a group exercise class (which I'll discuss more in Lecture 4, [Mental and Physical Wellness](#)) where everyone around you is pushing themselves. Conversely, checking email is contagious – research shows that when one person gets out their phone, others do so too.⁸

Second, don't be afraid to hold others accountable for creating distractions. In my lectures, I have a strict no-phone policy. Some students see this as overly stringent, and I could probably get higher teaching ratings by not having this policy. However, my goal is not to improve my teaching ratings, but to help students learn. One may think that it's easy in a lecture setting because I'm the professor and have legitimacy to choose the class rules. But in nearly every group setting, each member has legitimacy to enforce group norms. Group norms define what constitutes professional and courteous behaviour – how a human should treat another human. Everyone should be expected to follow them, regardless of rank, and everyone should have the right to enforce them. If someone is constantly late to meetings, every group member has a right to point this out; the same goes for someone who's constantly on his phone. In a meeting, it's tempting to think that you have something urgent that you need to keep on top of, hence checking email. But everyone else is busy; everyone else has an excuse to take out their phone. If you do so, you're effectively declaring that you think that your excuse is more important than everyone else's.

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This summary only covers a subset of the topics in the talk, to ensure it remains concise. Please see the talk for other topics such as the importance of saying no, how dealing with email differs between computer and mobile devices, sending precise emails, “throwaway” emails, and reducing meetings and conference calls.

⁸ Finkel, Julia A. and Daniel J. Kruger (2012): “Is Cell Phone Use Socially Contagious?” *Human Ethology Bulletin* 27, 15-17.