

The War of Trading

Week 3 @ Optiver

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A Typical Day Sounds Like...

After two weeks of theory lectures, we headed to sim-trade alongside the market in the third week. My timetable became much more hectic – A typical day (simplified) sounds like this:

- 7:00 – wake up in hotel, get everything done in 30 mins. It's a 20 mins (4 km) cycling trip back office.
- 7:55 – Working breakfast on trading floor table. Have to prepare market news briefing alongside. Usually I take a coffee shot to stay alert (and have social energy) through day.
- 9:00 – Start trading after morning meeting and system adjustments. Market dynamics, events experienced, and trading strategies vary every day.
- 17:35 – Market closes. Whole group discusses special things that happened, instructor gives feedback, logs PnL and limit breaches.
- 18:15 – Back to my own desk writing daily wraps. I have a hard time meeting the deadline as I have to finish dinner on table while organizing my thoughts of the day well. Usually I submit my wraps at 20:00-20:30.

- 20:30 – Got my work done for the day. Satisfied with what I learnt but am drained. Bike back hotel. Finds it fascinating that the sky is still bright and sun is not set.
- 20:55 – Back to hotel. Getting chores settled usually takes 20-35 minutes – laundry machines in hotel are sometimes problematic.
- 21:30 – my only “free” time (1-1.5 hours) of the day. Usually, I spend 15 minutes to write a daily reflection here to separate work and personal thoughts; on rare occasions I might call a friend. In most cases though, I’ll answer messages from ig/ wts, or read LinkedIn threads to capture any “interesting” ideas;
- 23:00 – go check my laundry (sometimes the machine isn’t turned on and it would be very annoying) and grab them back in the room if done. On tired days I’ll sleep before 23:00 as I generally need 8-9 hours to recharge to full capacity; 7.5 would be minimally acceptable, and <7 will not give me enough energy to last the day.

Immersed in full-time trading this week, I have a lot of takeaways in both technical (not gonna cover here – prop information) and personal terms. For the latter, I reflected on how alike trading is to a war (it makes me recall why most FTs I meet here around do strategic games), and how people excel in trading so.

Aggression: A War on Two Fronts

Trading arises from demand-supply imbalance – in some sense it is a war between people thinking it is undervalued (buying side), and those who think otherwise (selling side)

- Those give rise to the two war fronts of the order book: bulls and bears. Depending on liquidity, volatility expected and time of the day, you choose to either cross the spread (market order) or provide liquidity (limit order).
- When other participants take your order on one side, have the idea of retreating in mind as it further increases your EV of the trade – and decreases the likelihood you’re in the wrong with more favourable prices. It’s just like in a war, it’s not always necessary to take offensives. The rational side of the aggression story tells us to stay calm and only take opportunities.

- Interestingly, humans are often overaggressive. Sometimes we take risks without considering the consequences as the aggressor – this is particularly relevant to the momentum effect.
- I argue that one motive of this is because in reality, “support” is largely dependent of sentiments, and momentum effect prevails in a way that, we often wish to be aggressive to push things over.

We humans are “social animals” and take what happens immediately around us into account with more weights. Examples include FOMO – when you see people around you (particularly those you trust) switch to do something, you’ll to some extent be slightly bent towards the idea. Trump’s “Make America Great Again” tagline might be another of such form of successful aggression.

- In deciding our trades with someone, apart from believing in our theoretical values to choose where to retreat and where to be aggressive – we should also assess our own confidence on how likely that our own judgements would be correct. In the textbook world, security prices are static and the concept of “arbitrage” was much better defined. But in reality, prices move and often the book is thin. We also easily get biased by pricings.
- In the open market though, we might find many more things being arbitrary. For instance, large trades are implicit testimonies from other market players on valuations; momentum effect does exist in the market. Sometimes the decision to go aggressive might be stupid or risky from a rational perspective – but they do fool people sometimes.

How confident am I? What initiatives should I take? That seems like something I can answer better with extensive experience.

Implicitly, socializing is a form of trade too, about the mutual valuation with respect to each other, on the info exchange and mutual liking – there are often more about someone that you don’t know by merely interacting with them shallowly.

We often need something additional to ensure we’re in a relative advantage in such wars. But what advantages can we take?

Taking Advantage

- In such wars, information and the quality of your responses become the biggest differentiators.
- In the context of market making, items such as relationships with counterparties, extent of exposure of information, pricing and execution research and your own experience.
- Methods: Talk to more people within the space, do your own research, listen/ read more to how others or your friends within different spaces would do.
- The “best” strategies are devised as you realize the meaning of each piece of information you receive from the market, past statistics and ongoing events.

Sun Tzu once said “If you know the enemy and know yourself, you need not fear the result of a hundred battles” (知己知彼，百戰不殆).

→ Additional quality information shape our unique information edges

Info In, Info Out

I believe in the notion “info in, info out”:

- ❖ Quality of your work is upper-bounded by your information quality, your intelligence in making good use of them and experience.

→ **Input, Processing, Output** all matters.

- ❖ **Input:**

Try to be well-informed. Information input streams can come from chats, more readings/ materials saved, or reflections of own experience.

In the context of socializing, it could mean to observe people around more, their cultural norms and standards, and the reasoning for their thoughts. You need not necessarily follow suit, but it is always the best if you understand people’s underlying motives.

But too much input would cloud your mind, so make sure to clear them out every now and then!

❖ **Processing:**

This is the stage where intelligence and experience both matter. Examples:

- (i) Filtering out key info that matters.
- (ii) Understand how insiders carry out the processes.
In the context of market research, it could be what necessary aspects of info is extracted, or asking others for their own methods for quality work.

❖ **Output:**

Organization (sticking to mutually recognized formats working in a team), recognizing what the team values in your output, or simply being user-friendly in output.

Comprehensive processing of information and knowing what you can do with what you know give massive advantages.

In the context of trading, my deficiencies might be input (lack of relevant connections and low information load capacity) and processing (lack of experience and low speed). I don't really worry about quality, but I do worry a lot about time.

I don't really
have the energy left to tell/ listen anyone about their respective days