

Oxbridge Capital Partners

Quarterly Review Newsletter (March 2018)

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Introduction

Oxbridge Capital Partners (OCP) [2, 3] has been able to maintain respectable performance measures in the last quarter despite a tumultuous equities market, stagnant commodities market and, quite frankly a disappointing cryptocurrency market. We have also continued our R&D efforts and are proud to say that we have been able to fully automatize our forward looking risk parity trading strategy [2]. We decompose and reflect here on our performance and layout out some other news and progress.

Our Cryptocurrency Strategy

The Cryptocurrency market has been quite volatile in the last quarter and bearish for the last couple of month but despite an unfriendly market trend we have been able to keep our strategy afloat, making 50% return in the last quarter thanks to our diversified forward looking risk parity methodology (see figure 1). The only negatives is the draw-downs that we have experienced since mid-January. It can be speculated that we should have implemented a harder stop-loss on the strategy but that would have meant also missing out on rallies from the market and paying additional transactions costs in the process. Our approach instead is to keep a lower weight on the specific, highly volatile, strategy in order to fine tune our overall performance (see figure 5).



Figure 1: Our Cryptocurrency focused strategy has been returning 50% in the last quarter, a good return with however an important drawdown that has been mitigated through multi-diversification strategies that are.

Our Overlay Strategies

Gold and Energy Exposure

Our Gold and Energy strategy strategy has been partially fulfilling its economical hedging rational by limiting our overall drawdown with however limited performance on its own.

Crypto-Mining Exposure

Our mining card strategy has been doing quite well in the last quarter as it can be seen from figure 2. More specifically the strategy made 12% in difficult market conditions.



Figure 2: Our Cryptocurrency Mining focused strategy has been achieving its role of lower hybrid proxy/overlay to our diversified cryptocurrency strategy, making 12% in the last quarter.

Banking Exposure

Another overlay strategy we are using is our Bank focused one. For more information around the rational, feel free to take a look at our previous reviews [2, 3]. However, the returns have been strong in the last quarter achieving on average 2% per month.



Figure 3: Our Banking focused strategy has been achieving its role of Cryptocurrency overlay, best performing, in the latter draw-down periods, making 8% in the last quarter.

Our Tech Exposure

Though we experienced a drawdown early to mid February our Tech Overlay returns have been strong in the last quarter achieving 14% in the quarter. For more information around the rational, feel free to take a look at our previous reviews [2, 3].



Figure 4: Our Technology focused strategy has been achieving its role of lower hybrid proxy/overlay to our diversified cryptocurrency strategy with 14% return in the quarter.

Our Overall Strategy

Our Cryptocurrency strategy was incorporated in a portfolio consisting of 4 overlays striving to aim for a fair balance between abiding by the rules associated to the risk parity theory amongst the core strategy and the overlays while keeping the rebalancing cost in mind. Overall we have been able to sustain strong consistent results on a quarterly basis timescale, achieving 7% in the last quarter overall.

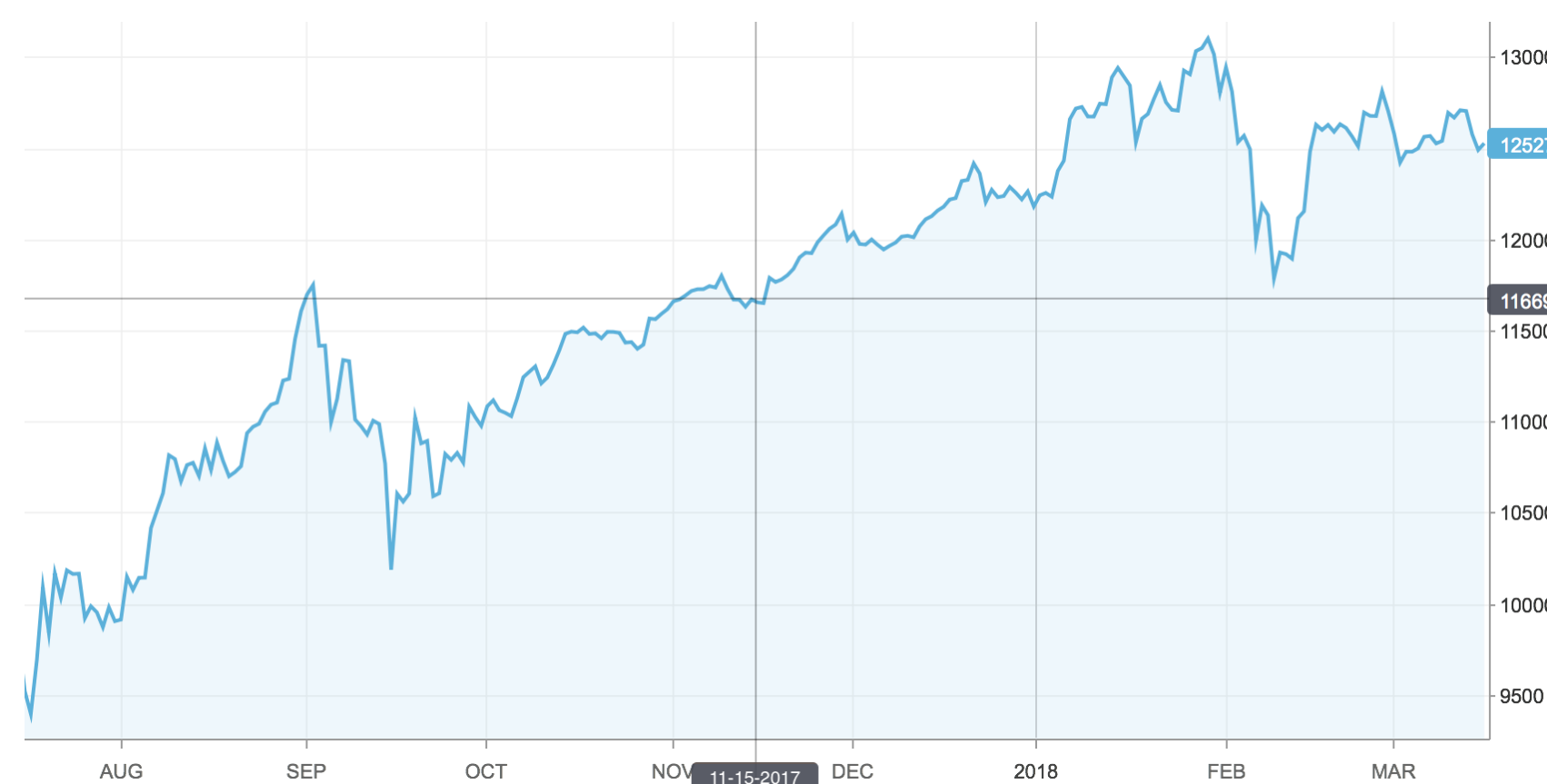


Figure 5: We have achieved, in our low frequency cross asset strategy about 7% in the last quarter.

Research & Development

As we have mentioned in the introduction we have been able to fully automatize our cryptocurrency strategy [2] using the Poloniex API. We are currently running the algorithm in the high frequency domain with a low exposure as the final step of our testing phase. If the testing phase proves conclusive we will move all of our cryptocurrency strategies into our systematic algorithmic trading strategy. We do not have a set date of when this will be but we expect to give an update in our next bi-yearly newsletter in May 2018. We have now started a new phase of research at the higher frequencies. Learning most of the advanced function of the Poloniex API has placed us in a situation where investigating other APIS such as Bitrex has become easy. This has for final objective to start implementing our triangular strategy described in our previous bi-yearly review [3]. Also we were able to recuperate very valuable GitHub OOP code which

we are currently trying to expand and adapt to our trading systems. We are also trying to organize our strategies under an OOP framework in which the mother class will consist of the HFFF recently introduced [1] which we plan to first test with few Oscillators (short-term overbought or oversold conditions), starting with the celebrated MACD (see figure 6).

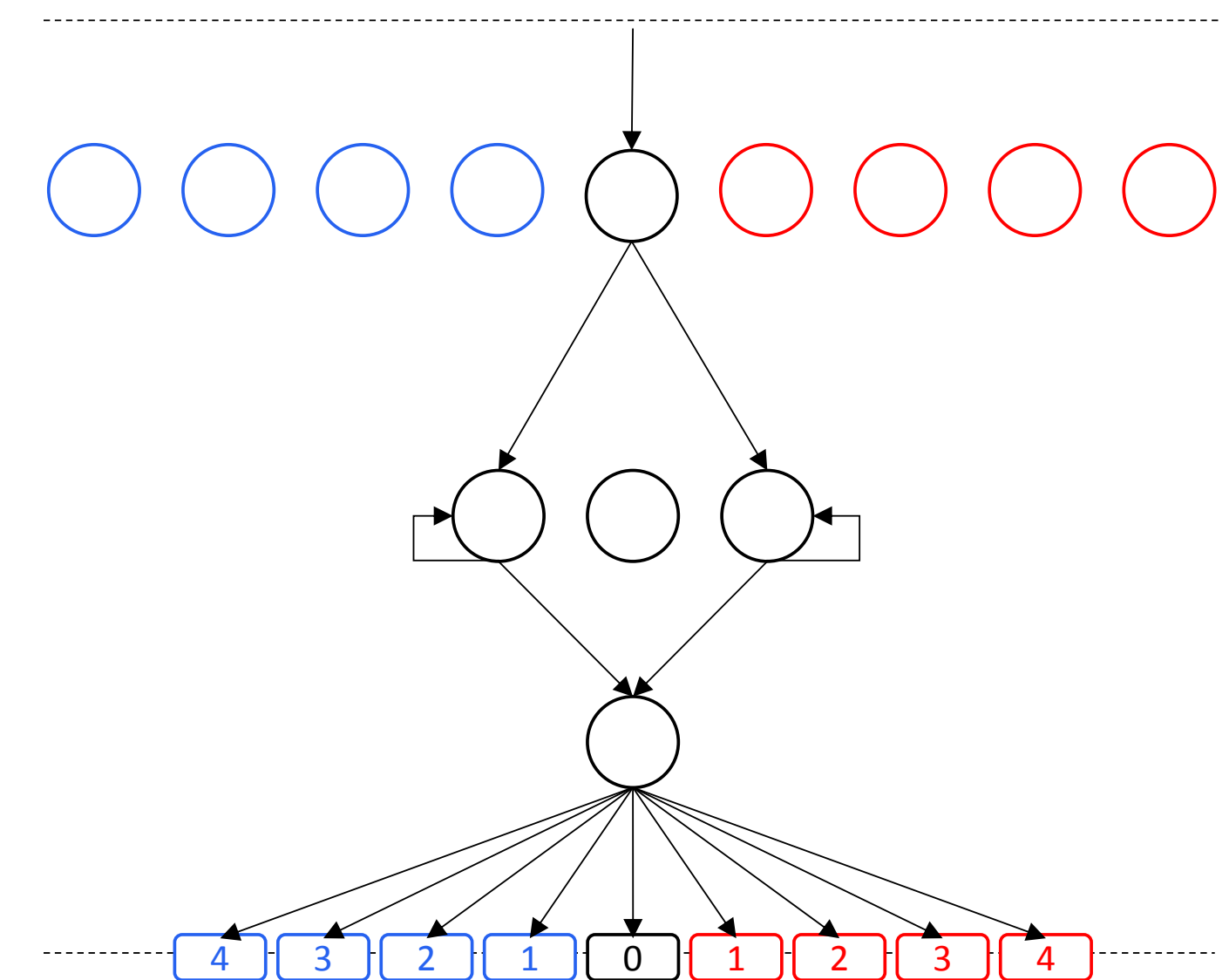


Figure 6: A MACD family strategies translated in terms of our HFFF [1] network topology (the weights equal to 0 have not been represented). If one is looking specifically for a MACD(12,26), then the weights of the hidden layers must be such that $\alpha_{12} = 2/13$ and $\alpha_{26} = 2/27$ and the ones of the output layers must be a simple subtraction to abide by the above definition.

Call for Investors

We are currently discussing increasing our capital with external investors and have had our first verbal commitment with [Iratel Ventures](#). The scope of the collaboration could go as far as a partnership and potentially expand to incorporate few other start-ups such as [Elvotra](#) or [Marloe Guiluz](#) that are currently in a state of unstructured partnership with [Iratel Ventures](#) but which skills could contribute in reinforcing our IT infrastructure as well as potentially help us diversify and expand our [app capabilities](#). We still have some room for growth though as we are now expanding on the equities market and will close the window sooner than later as cryptocurrency strategies especially in the higher frequency cannot accommodate an exorbitant capital. For this reason, in order to limit the number of investors we have reviewed our fee model back to the “2 & 20” or “1 & 30” fee models.



Babak Mahdavi-Damghani (BMD), projected CRO (currently deputy CEO), did his PhD in Machine Learning for Quantitative Finance at the University of Oxford. He has a broad range of work experiences in the financial industry and is also the author of numerous [publications](#) (eg: [Cointelation](#), [IVP](#), [UTOPE](#) & [HFTE](#) model).



Alex Ksikes (AK), projected CTO did his PhD at the University of Cambridge in Machine Learning. He has a broad range of experience in the start-up and tech industry including as an early adopter of Bitcoin and other cryptocurrencies. He is also the author of numerous [publications](#) in Machine Learning and tech related topics.



Fred Firouzi (FF), projected CFO, did his undergraduate and postgraduate studies at the Ecole Polytechnique where he specialized in Probability Theory & Finance. His expertise is in the pricing and hedging of complex financial products exhibiting jumps in price. He also has extensive experience in algorithmic trading and API handling.

References

- [1] Babak Mahdavi-Damghani. [Introducing the HFTE Model: a Multi-Species Predator Prey Ecosystem for High Frequency Quantitative Financial Strategies](#). *Wilmott*, 89:52–69, 2017.
- [2] Babak Mahdavi-Damghani. [Introduction to OCP](#), 2017.
- [3] Babak Mahdavi-Damghani. [OCP Bi-Yearly Review](#), 2018.

Disclaimer

In order to abide by the regulations laid out by the SEC & FCA, we take this opportunity to remind, that although done in good faith, this documents cannot be interpreted as financial advice and that historical returns are not a reliable measure of future performance.