Quantum The monthly newsletter of the Deutsche Bank Quantitative Strategy team

Welcome to the March edition of the DB Quantitative Strategy Team's monthly newsletter, **Quantum**. The aim of Quantum is to make it easier for you to keep track of all the research we publish, and to serve as a forum to highlight the latest news and thinking in the quant investing world. If you only read one email from us every month, make it Quantum!

It's been just over three years since we launched our quant research here at Deutsche Bank, and in that time we've published over 60 in-depth research papers. The downside of so much output is that it's often quite hard to keep track of all the models we have studied. So to make things easier to keep track of, we've introduced two new publications: **The Quant View** in the US and **Quantfucius** in Asia. Both are monthly publications, and are designed to present the current recommendations from what we think are our most useful models. These recommendations include stock, sector, style, and country calls. If you just want to know what to buy or sell without getting bogged down in the model details, these papers are a good place to start.

On the other hand, if you want to delve into the details of a new model, check out our new paper **Uncovering Hidden Economic Links**. In that research we use an interesting database of company-level economic relationships (e.g. suppliers, customers, competitors, etc.) to indentify "economic clusters" of companies. Within those clusters, we use a statistical model to capture the co-dependence in returns of these economically-related stocks. We then use that model to make return predictions.

Regards,

The Deutsche Bank Quantitative Strategy Team
North America: +1 212 250 8983
Europe: +44 20 754 71684
Asia: +852 2203 6990
DBEQS.Global@db.com | https://eqindex.db.com/gqs/

Recent Research

North America

- **Signal Processing: Uncovering hidden economic links** (March 28th, 2013): we use a unique database of company-level economic relationships to build a stock selection model. Our model, which we call the QLINK model, identifies clusters of economically-related stocks and then uses a statistical model within each cluster to forecast future returns. To read the whole report, click here.
- **The Quant View** (March 3rd, 2013): In this report we present our latest quantitative forecasts for the coming month. Mergers are back in fashion, so we take the opportunity to update our quantitatively-driven M&A screen. Our model uses unique early warning flags like abnormal intraday trading patterns or unusual options activity to detect potential takeovers. To read the whole report, click here.

Europe

- **Top-Down Monthly Update: MCRM update** (March 1st, 2013): The MCRM model uses economic trade flow data to rotate among countries. This month the allocation in the long portfolio includes Emerging Market countries, Japan, and Australia. In the short portfolio, we highlight the exposure to North America, and Northern Europe. In the short portfolio, we highlight the exposure to Europe and Canada. To read the whole report, click here.

Asia

- **Quantfucius: Quantitative ideas for investors in Asia** (March 6th, 2013): In this new monthly report, we showcase the best ideas based on our quantitative signals and model forecasts. We include both bottom-up stock selection ideas as well as top-down country allocation calls. To read the whole report, click here.

Global

- **Academic Insights: Harnessing the best ideas from academia** (March 25th, 2013): Every month we scan the latest academic research for innovative but practical quant investment ideas. This month one of the interesting papers we highlight looks in detail and the banking sector, and more importantly how to model these types of companies, which are always problematic for the typical quant factors. To read the whole report, click here.

Note: to access these links you need a login to the DB Quant website; if you don't have a login, or have forgotten your password, please click here and fill out the requested details.

Quant in the News

Interesting news articles related to quant investing:

- **Our Bodies, Our Spreadsheets: Fitness Quants on Rampage** (*bloomberg.com*, March 7th, 2013): Ok, just because a story has "quant" in the title doesn't mean it is about quant investing. Nonetheless, on a more serious note this is just another example of the "quantization" of the wider world outside of finance. Now you can be a geek and a triathlete at the same time. To read the whole article, click here.

Quantomatic: Latest trends in quant technology

Each month we use this section to focus on the technological side of quant investing. Our view is that better technology can be a source of alpha in its own right - either via new, cutting-edge data sources or through more data intensive modeling techniques.

Recently we came across an interesting company called QuantConnect that perfectly embodies the intersection between quant and technology. QuantConnect is a startup that is trying to "democratize" quant investing. Most of us, who have spent too many late nights trying to fix a recalcitrant server or debug a crashed SQL script, know that the biggest barrier to entry in quant is the IT infrastructure required to maintain a robust backtesting and production environment. QuantConnect overcomes this by offering a cloud-based platform that is pre-loaded with the data and backtesting capability that is needed to test strategies. However, the really cool feature is that once you are happy with your backtested strategy, you can actually turn it on live, and even connect it directly to your brokerage account to trade it in real time.