Upside-Down ETFs, Down Under

Why Read This?

Australia's market is widely seen as a parallel to Canada's. In the ETF space, the parallel turns orthogonal. We explain a head-scratching ETF market making approach from the other side of the world.

We also take this opportunity to announce the launch of ETF Edge, Scotiabank's weekly ETF publication on the Canadian ETF market. To ensure you receive this publication going forward, please contact Andrew Moffatt or etfresearch@scotiabank.com.

Quick Recap of ETF Market Making

In a typical ETF market, there is a very clear delineation between church and state: product manufacturers manage a fund, but do not interact with clients (at least for the purposes of trading). On the other hand, market making desks (be they bank-run or independent) provide investors with a bridge into the fund.

ETF market making desks perform several core functions:

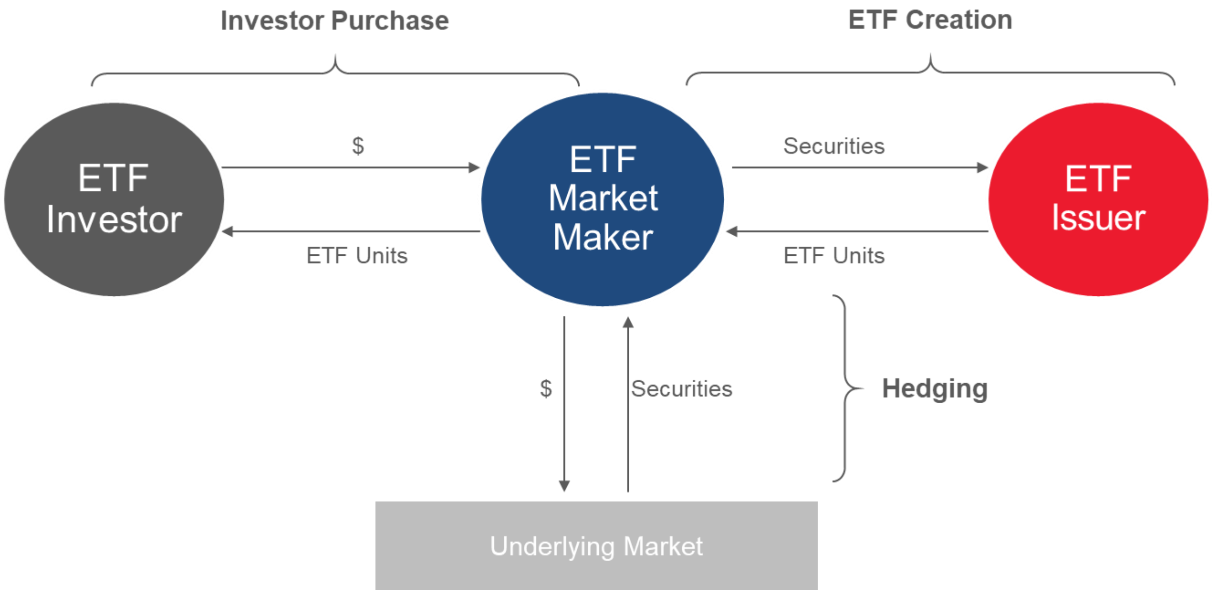
- Establishing the prices at which they are willing to buy and sell units of an ETF.
- If a trade occurs, managing the resulting risk.
- Engaging in ETF creation and redemption activities as a way of managing (typically minimizing) inventory levels.

Without the ability to manage inventory levels by facing the fund and creating or destroying units at will, market making desks would typically be unwilling to risk being short-squeezed, or stuck holding inventory that is not in demand on the back of an investors' sale. In other words, ETF creation/redemption is an enabler.

The ability to create and redeem is necessary for ETF market making, but it is not enough. To establish reliable and fair market prices, ETF market making desks rely on knowing the composition of each fund to continually price its indicative fair value (i.e. what the fund is worth at any given time) and also to manage hedges to ETF positions that may be on the books. This disclosure is utterly essential to fair pricing; without it, ETF desks will need to build uncertainty into their quotes in the market, and ultimately investors will bear the cost of that uncertainty through worse pricing on their trades.

The standard approach in North America is to disclose portfolio composition to the public at large (practiced in the U.S., and today by a minority of Canadian ETF issuers) or to ETF market makers only (common in Canada).

The final leg of the journey is in our view the most important of all: the externalization of investors' trading costs from the fund. In the ETF structure, the issuers can dictate the terms of engagement to dealers and establish mechanisms by which the fund is protected. The most common of these is the "in kind" creation and redemption process. When a fund grows through new investment, the fund manager receives a portfolio of securities from the creating dealer rather than receiving cash. This portfolio is typically either a slice of the existing holdings of the fund, or an approximation of the fund's risk factors (through sampling). The result is that the fund does not need to trade to invest an inflow, and fund investors are not on the hook for any frictional costs. Instead, the costs of acquiring the portfolio are borne by the dealers facilitating the investors' trade in the first place.



Not all funds are suitable to in-kind mechanics. For example, funds holding non-deliverable assets (such as swaps, syndicated bank debt, or equity index futures) typically cannot receive them from their dealer counterparties. Those assets will have a cost of acquisition. In the ETF context, the fund manager can accept cash but will charge a creation fee which will accommodate the frictional cost of execution borne by the fund on behalf of the dealer doing the creation in the first place. Once again, the investor is protected.

Finally, in many instances a fund domiciled in a particular region will hold securities that trade in other time zones. In the mutual fund world, this creates issues around stale NAVs and the ability to game forecasted price movements. In the ETF world, the solution is simpler: creations are subject to time cut-offs and may be effected at a future date, which allows the fund manager to protect unitholders by ensuring that their calculated NAV is investable.

It bears noting that mutual funds in Canada and in the U.S. do not offer these protections. The fund holder is responsible for all frictional costs in the fund resulting from inflows and outflows. Excess market impact costs are born by other unitholders – a particularly acute problem when the market impact costs are facilitating a large departing unitholder. For this reason, we believe the ETF structure is fundamentally more equitable than a traditional fund structure: it passes the cost of trade implementation (and associated bid-ask spread) on to end investors.

The final piece of the puzzle is that typically multiple market makers compete against each other – ensuring both marketplace resilience (the functioning of the market isn't reliant on a single firm) and fairness (egregious pricing will be uncompetitive, and mispricing will be arbitraged out of existence).

Why are we talking about this? Because Australia turned the entire model on its head with a concept called "internal market making."

Internal Market Making: Let the Issuer Do It!

As noted above, a critical component to a working ETF structure is portfolio disclosure to the market makers. This poses an issue for fund managers who are concerned that their secret sauce will leak all over the kitchen and spill into the mouths of hungry copycats. In the U.S., the regulatory response has substantially been for those concerned parties to suck it up: portfolio holdings must be disclosed daily, and if secret sauce is a problem, don't launch an ETF (though this is being debated at length). In Canada, the regime allows for narrow (dare we say selective?) disclosure to ETF market making desks under NDA provisions, without public disclosure. This is intended to protect the IP of the fund manager while still permitting ETF market making – and is not without problems.

Australia has gone a different way: in some circumstances, ETF issuers are permitted to engage in market making directly, with no disclosure of portfolio holdings to the public at large – and no ability for third party market makers to compete.

Fund managers running active strategies with (tasty) secret sauce can apply to the ASX for an internal market making ("IMM") arrangement, under which the issuer is responsible for maintaining liquidity in the fund. To qualify for IMM, issuers must either disclose the fund portfolio daily, or publish a frequent indicative intraday net asset value ("INAV") to the market. The INAV is the issuer's best guess at what a fund is worth at any given time. We believe they do more harm than good, but this is a discussion for another day.

In practice, if an issuer has secret sauce, daily public portfolio disclosure to the public is off the table. Publishing the INAV isn't a monumental barrier. The path seems clear to us.

Once established as an IMM, the fund issuer begins making a market in an ETF – either directly or through an agent. Any executions in the market are directed into the fund each day under pre-established creation & redemption procedures – and the issuer is not permitted to maintain treasury stock.

Under this scheme, a fund issuer is the sole party with definitive knowledge of the assets of the fund, and therefore the only one able to reasonably value it. They are also actively trading in their own securities, and presumably taking market risk to facilitate client inflows and outflows.

This raises a few issues:

- The fund manager is on both sides of the ETF creation: they control the structural investor protections offered in the fund, and they also price the securities in the market. To the extent the issuer looks to raise assets, the incentive is there to loosen investor safeguards in the name of driving assets into the fund.
- Fund managers are typically not required to maintain capital adequacy to account for the possibility of taking a trading loss. In fact, most fund managers do not carry large balance sheets; the assets they manage belong to clients. This begs the question: what happens if the fund issuer isn't particularly good at intraday market-making, and suffers a big loss? What happens if the technology breaks?
- There is no assurance to investors that the pricing seen in the market is fair. Fund managers "should" be able to price their own fund, but in practice intraday valuation can be a tricky matter. The value of assets trading in other time zones is an educated guess, which market making firms hedge through diversification, breadth and scale. A fund manager in a single geography is unable to achieve this scale – because IMM is limited to Australia.

The most important of these, in our view, is the conflict of interest inherent in the arrangement. Fund managers make money by charging fees on assets, and AUM growth is the road to profitability. Investors frequently complain about bid-ask, which means that fund issuers acting as fund market makers have a strong incentive to minimize investors' frictional cost of inflows. The easiest way to do this is to pass the implementation cost onto the fund through cash creation arrangements that effectively subsidize investors' inflows.

If conflict of interest concern isn't enough, we also scratch our head at arrangements where a single firm has unique information about the value of a security and is expected to trade on that information with its clients. Perhaps this is just old-school thinking on our part?

Agency IMM: Skip the Issuer

If issuer-level conflicts and concerns weren't enough, the ASIC guidelines contemplate an "agency" model whereby the agent is acting on behalf of the fund itself. ASIC guidelines on the topic describe the arrangement as follows:

> *Under one version of an internal market-making arrangement, the issuer appoints a trading participant to act as agent to provide bids and offers in the ETP units throughout the day* ***on behalf of the ETP****. Under this arrangement, at the end of the trading day* ***any profit or loss based on the market-making activity is attributed to the ETP*** *and a net creation or redemption in the units is performed by the ETP.*

(emphasis ours)

In other words, there is a means by which the issuer does not need to risk its balance sheet at all. Vanilla internal market making arrangements that could involve the issuer's balance sheet create conflicts of interest. Those conflicts are magnified when it is the fund, and not the issuer, that faces investors and handles all implementation costs.

In this upside-down world, investors in the fund are responsible for funding the difference between the issuer's estimate of market impact costs (i.e. whatever bid-ask spread is in the market) and the real cost to the fund. In the traditional ETF market making world, dealers invest millions of dollars in systems that manage this risk. If the fund will ultimately bear these costs, but the issuer pays for the systems, the incentive to invest heavily in market making excellence is limited.

All this said, the sky in Australia isn't falling: IMM arrangements amount to a small part (~5%) of an already-small ETF market. This scheme is the exception and not the norm.

Where is ASIC In All This?

Important caveat: we are not in any way experts on the Australian regulatory fabric.

The Australian Securities & Investment Commission (ASIC) published a set of guidelines to the operation of exchange traded products.

On the topic of "Disclosure of portfolio holdings", the ASIC appears to defer to the exchange operators:

> *We expected that* ***licensed exchanges*** *will* ***generally*** *require ETFs and managed funds to publish on a daily basis the full*

portfolio of the ETP's holdings"

Similar language is in place on the topic of liquidity provision and market making:

> *[licensed exchanges] have mechanisms in place to alert them when there are concerns that investors are unable to consistently trade at a price close to the NAV (whether there is a market maker or not and whether a market maker participated in the trade or not). For example,* ***licensed exchanges should be monitoring whether spreads are reasonable in comparison to the transaction costs*** *and making inquiries where any difference in price relative to the NAV significantly exceeds the likely transaction costs for buying or selling the underlying assets, and*

Finally, on the topic of internal market making, ASIC again defers to the exchanges:

> *In very specific circumstances,* ***licensed exchanges may allow the issuer to adopt the role of market maker*** *(i.e. an internal market-making arrangement) rather than using an independent third-party trading participant. This should only be considered in exceptional cases* ***when the licensed exchange and issuer have tight controls in place to monitor this****.*

All emphasis ours.

This is head-scratching. We are skeptical that any exchange can adequately monitor whether "spreads are reasonable in comparison to the transaction costs". This analysis is called "pricing the risk" and requires skin in the game. We think the only means of ensuring that spreads are reasonable is to make sure that economically-incented firms compete with each other.

The delegation of duty to the exchanges also creates a conflict of interest. Marketplaces in Australia are for-profit entities. Their clients are issuers, who pay listing fees. The profit motive will lead exchanges towards arrangements that permit IMM, and the same profit motive will counter (at least in part) the ability of exchanges to police their issuers' questionable practices. This is the core reason why the Toronto Stock Exchange's regulatory function was ultimately moved into a fully independent entity, Regulation Services Inc., which is now IIROC.

For what it's worth, ASIC now appears to be asking more questions about the entire IMM practice. Recent news the region indicates that ASIC has put a halt on new IMM arrangements pending regulatory review. Perhaps, in time, Australia will look more like Canada?

Word of the Day

Secret sauce (n.): an element, quality, ability or practice that makes something or someone successful or distinctive.

Please do not hesitate to contact us if you have further questions.

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