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## On the Dark Side of the Market: Identifying and Analyzing Hidden Order Placements

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### Abstract

Trading under limited pre-trade transparency becomes increasingly popular on financial markets. We provide first evidence on traders' use of (completely) hidden orders which might be placed even inside of the (displayed) bid-ask spread. Employing TotalView-ITCH data on order messages at NASDAQ, we propose a simple method to conduct statistical inference on the location of hidden depth and to test economic hypotheses. Analyzing a wide cross-section of stocks, we show that market conditions reflected by the (visible) bid-ask spread, (visible) depth, recent price movements and trading signals significantly affect the aggressiveness of 'dark' liquidity supply and thus the 'hidden spread'. Our evidence suggests that traders balance hidden order placements to (i) compete for the provision of (hidden) liquidity and (ii) protect themselves against adverse selection, front-running as well as 'hidden order detection strategies' used by high-frequency traders. Accordingly, our results show that hidden liquidity locations are predictable given the observable state of the market.

**Keywords:** limit order market, hidden liquidity, high-frequency trading, non-display order, iceberg orders**JEL Classification:** G14, C24, C25, G17[Suggested Citation](#) >[Show Contact Information](#) >[Download This Paper \(Delivery.cfm/SSRN\\_ID2004231\\_code1399947.pdf?abstractid=2004231&mirid=1\)](#)[Open PDF in Browser \(Delivery.cfm/SSRN\\_ID2004231\\_code1399947.pdf?abstractid=2004231&mirid=1&type=2\)](#)

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