

# The High-Frequency Factor Zoo

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## Abstract

I construct a novel dataset of 224 high-frequency factor portfolios in order to study the cross-section of expected returns in a continuous-time setting. I estimate the continuous and semijump risk premia for each of these factors and find that jump and semijump risk are often priced and command a larger risk premia than continuous risk. Furthermore, there are only a few clusters of factors, corresponding to less than a third of the zoo, with significant continuous and semijump risk premia. Additionally, I decompose cross-sectional variation in expected returns into variation from exposure to the continuous and jump factor risk. I find that the majority of cross-sectional variation comes from jump risk and that most stocks draw significant jump risk premia.

**Keywords:** Factors; asset pricing; high frequency data; jump risk premia.

**JEL Codes:** C55, C58, G11, G12

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