<div align="center">**Readme file**</div>

Data description on Lof, M. and H. Nyberg (2023): "Discount Rates and Cash Flows: A Local Projection Approach"

This readme file describes the annual and monthly datasets. It essentially repeats Section I of the Internet Appendix

Returns, dividends and dividend price ratios

Monthly and annual observations of market returns r, dividend growth rates Δd, and dividend yields dp, are constructed from the CRSP data as described in Section 3 of the paper. We use three dividend reinvestment strategies: reinvestment in the risk-free rate (source: Kenneth French data library), reinvestment in the market return (CRSP value-weighted market return) and no reinvestment.

We also consider real returns and dividend growth, by subtracting the log-difference in the consumer price index (CPI). For monthly dividend growth, annual dividend growth and annual returns, we adjust by using the 12-month log-difference in CPI, while for (real) monthly returns we use the 1-month log-difference in CPI. The source for the CPI data is Robert Shiller's dataset: `http://www.econ.yale.edu/~shiller/data/ie_data.xls`.

Additional state variables

State variables, listed in Pabel B of Table 1 of the main paper, are described more detail in Welch and Goyal (2008) and obtained from the updated annual and monthly datasets on Amit Goyal's website: `https://sites.google.com/view/agoyal145`.

Some constructed state variables: Quarterly observations of the cointegration relationship between consumption, asset wealth and labor income cay are obtained, following Lettau and Ludvigson (2005), as the residuals from the regression: $c_t = \alpha_0 + \alpha_1 w_t + \alpha_2 y_t + \epsilon^{cay_t}$, where c, w, and y refer to (log) consumption, wealth and labor income, respectively. All the data are obtained for the period 1952:Q3–2019:Q3 from Martin Lettau's website: `https://sites.google.com/view/martinlettau/data`. Annual observations of cay correspond to the fourth quarter observations. Monthly observations in the last month of each quarter correspond to that quarter's observation, while the monthly observations in the first two months of each quarter correspond to the previous quarterly observation.

In a similar fashion as cay_t, quarterly observations of the cointegration relationship between consumption, dividends and labor income cdy are obtained, following Lettau and Ludvigson (2005), as the residuals from the regression: $c_t = \beta_0 + \beta_1 d_t + \beta_w y_t + \epsilon^{cdy_t}$, where c, d, and y refer to (log) consumption, dividends and labor income, respectively. Quarterly observations of c and y are obtained for the period 1952:Q3–2019:Q3 from Martin Lettau's website, while quarterly dividends d are obtained from CRSP. The remaining five observations of c and y up to 2020:Q4 are constructed based on the consumption (PCE) and cay data. Quarterly observations of cdy are converted into monthly and annual observations in a similar ways as cay (see above).

Monthly observations of the cointegration relationship between dividends, prices and earnings dpe are obtained, following Garrett and Priestley (2012), as the residuals from the regression: $d_t = \gamma_0 + \gamma_1 p_t + \gamma_2 e_t + \epsilon^{dpe_t}$, where d, p, and e refer to (log) dividends, prices, and earnings of the S&P 500 index, respectively. The source is Robert Shiller's dataset (see above). Annual observations of dpe correspond to the December observation of each year.

The output gap gap is constructed following Cooper and Priestley (2009) as the residual of a regression of the monthly industrial production index (Industrial Production: Total Index (INDPRO), source: FRED St. Louis) on a linear and quadratic trend. Annual observations of gap correspond to the December observation of each year.

Monthly observations of the cyclically adjusted log price-earnings ratio $pe10$ are included in Robert Shiller's dataset as the log of the ratio of the S&P 500 index (price) to the 10-year moving average of earnings. Annual observations of $pe10$ correspond to the December observation of each year.

Monthly and annual observations of the value spread vs correspond, following Campbell and Vuolteenaho (2004), to the log value spread among small firms. Using the monthly and annual value-weighted returns on 5×5 portfolios of firms sorted on size (ME) and book-to-market (BM) (source: Kenneth French data library), vs is equal to the difference between small high-value stocks and small low-value stocks: $vs = log(1 + R_{ME=1,BM=5} - R_{ME=1,BM=1})$.

Option-based state variables

Monthly observations of the risk-aversion index ra and the uncertainty index unc are obtained from the website of Nancy Xu: `https://www.nancyxu.net/risk-aversion-index`. Estimation details behind these indices are given by Bekaert et al. (2022). Daily observations of the equity variance premium vp and the conditional variance of stock returns cv are obtained

from the website of Marie Hoerova `http://www.mariehoerova.net/`. We only use the end-of-month observations for our analysis. Details behind vp and cv are in Bekaert and Hoerova (2014). Variables ra and unc are available from 1986, while vp and cv are available from 1990.