

**Figure 1:** Time series plot of 250 simulated jumps  $\mu_i$ , returns  $x_i = \mu_i + \epsilon_i$ , and posterior means of jumps  $\hat{\mu}(x_i)$ , where  $\epsilon_i \sim \mathcal{N}(0,1)$ , the number of jumps is set deterministically to 10, and the conditional jumps  $\mu_i \mid (\mu_i \neq 0) \sim \mathcal{U}(-7,7)$ .

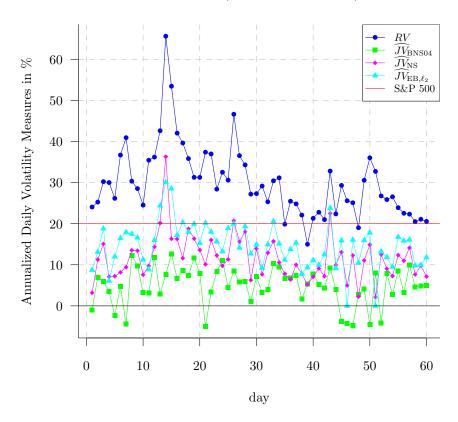
**Table 1:** MPE for s = 10, constant volatility

|                                     | # Jum | ps   |       |       |
|-------------------------------------|-------|------|-------|-------|
| Est.                                | 0     | 3    | 10    | 30    |
| $\widehat{JV}_{ m NS}$              | 1.3   | 0.2  | -1.0  | -6.4  |
| $\widehat{JV}_{\mathrm{EB},\ell_1}$ | 0.8   | 1.2  | -0.2  | -2.8  |
| $\widehat{JV}_{\mathrm{EB},\ell_2}$ | 0.8   | 1.4  | -0.1  | -2.7  |
| $\widehat{JV}_{\mathrm{BNS04}}$     | 0.3   | -6.3 | -15.2 | -27.5 |

**Table 2:** MAPE for s = 10, constant volatility

| # Jumps                             |     |     |      |      |  |  |
|-------------------------------------|-----|-----|------|------|--|--|
| Est.                                | 0   | 3   | 10   | 30   |  |  |
| $\overline{\widehat{JV}_{ m NS}}$   | 1.3 | 3.1 | 4.2  | 6.9  |  |  |
| $\widehat{JV}_{\mathrm{EB},\ell_1}$ | 0.8 | 4.0 | 4.3  | 4.4  |  |  |
| $\widehat{JV}_{\mathrm{EB},\ell_2}$ | 0.8 | 4.0 | 4.2  | 4.3  |  |  |
| $\widehat{JV}_{\mathrm{BNS04}}$     | 3.3 | 6.9 | 15.2 | 27.5 |  |  |

## WMT Jan 02, 2008 - Mar 31, 2008



**Figure 2:** Time series of daily annualized volatility measures in percentage terms from 1-minute returns of WMT over the 60 trading day period January 02, 2008 – March 31, 2008. Thus, daily RV actually refers to  $100\sqrt{252}\sqrt{RV}$ , the annualized daily realized *volatility*. We follow this with  $\widehat{JV}_{\text{BNS04}}$ ,  $\widehat{JV}_{\text{NS}}$ , and  $\widehat{JV}_{\text{EB},\ell_2}$  similarly. The red S&P 500 line gives the rough annualized daily volatility of the S&P 500 over the last number of years, plotted for reference.