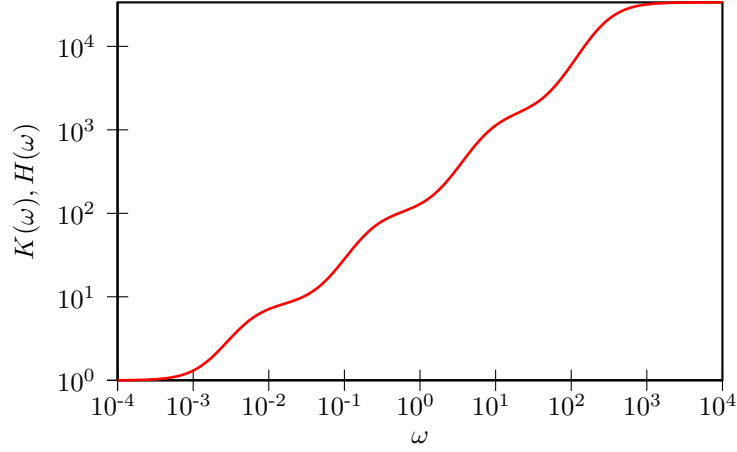


GENERALIZED LANGEVIN EQUATION ANALYTICS

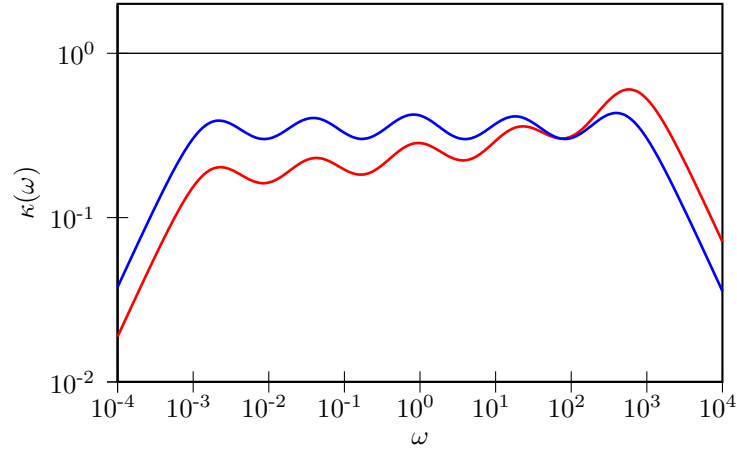
- Drift matrix A_p :

$$\begin{pmatrix} 3.5740 \times 10^{+02} & 2.4260 \times 10^{-02} & 5.1245 \times 10^{-01} & -1.0492 \times 10^{+01} & 2.9185 \times 10^{+02} \\ 1.2099 \times 10^{-02} & 4.1812 \times 10^{-03} & -1.0094 \times 10^{-02} & -1.0362 \times 10^{-02} & 2.2866 \times 10^{-03} \\ 3.7847 \times 10^{-01} & 1.0094 \times 10^{-02} & 1.9498 \times 10^{-01} & 5.6358 \times 10^{-02} & 5.2574 \times 10^{-03} \\ -1.0434 \times 10^{+01} & 1.0362 \times 10^{-02} & -5.6358 \times 10^{-02} & 7.0739 \times 10^{+00} & 2.6371 \times 10^{-03} \\ 2.9230 \times 10^{+02} & -2.2866 \times 10^{-03} & -5.2574 \times 10^{-03} & -2.6371 \times 10^{-03} & 2.5030 \times 10^{+02} \end{pmatrix}$$

- Fluctuation-Dissipation theorem is enforced, $C_p = k_B T$
- Memory kernel FT, $K(\omega)/K(0) = H(\omega)/H(0)$



- Sampling efficiency, for q^2 and $p^2 + \omega^2 q^2$:



- Free-particle diffusion coeff. ($mD/k_B T$): $9.4577 \times 10^{+01}$