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An on-line compensation of input additive disturbances: an evolving Gaussian process models approach

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Case study: compensation of input additive disturbances for servo positioning system

Figure 1: Servo positioning system with mechanical friction brake that can be manually engaged. The additional mass can be added for the gravity compensation experiment.

How to compensate for disturbance, i.e., to estimate $w(t)$?

Nonparametric regression, e.g., LLR or GPR + Efficient on-line learning

References

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