

# Course: Advanced Filter

credits: 2

Course code ELVH17AAF

Name Advanced Filter Study year 2020-2021

ECTS credits 2
Language English
Coordinator B.D. Williams

Modes of delivery Assignment

Individual supervision

Lecture

Practical / Training

**Assessments** Advanced Filter - Assignment

### Learning outcomes

After this study unit a student can:

- design a standard digital filter.
- use the Kalman filter in a data smoothing context, and also in a vehicle navigation context by using Sensor Fusion techniques.

### Content

As an extension to DSP techniques you will learn how to design an advanced filter. We will be handling specifically the KALMAN filter in the study unit, but will also recapitulate on a method on how to design common filters.

## Included in programme(s)

Electrical Engineering Major Sensor Technology

### School(s)

Institute of Engineering