

Attachment 3

## Audi Camera Mirror System (CMS) Exemption Petition

July 31, 2018

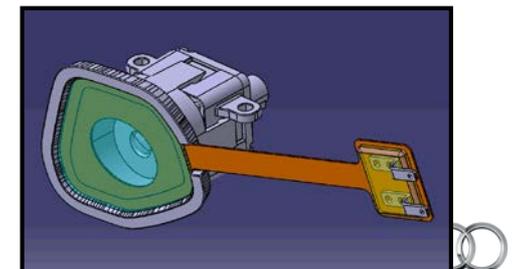
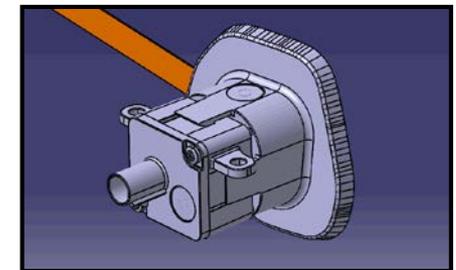
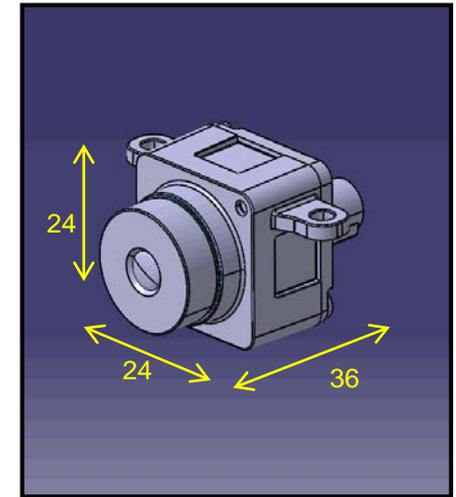
# System Component Wing

- ▶ Wing:
  - › Flat Design with newly developed folding mechanism (manual)
  - › Integrated VAS camera
  - › Integrated Turn Signal
  - › Integrate Top View camera



# System Component Camera

- ▶ Camera:
  - ▶ Imager
    - ▶ OV 10640
    - ▶ resolution 1280 x 1020
  - ▶ Heater
    - ▶ Integrated in modular top unit on protective cover glass
    - ▶ Control via the ECU
- ▶ Video data conduction
  - ▶ Power over Coax
- ▶ Lens
  - ▶ Opening angle
    - 40° Vertical
    - 30° Horizontal

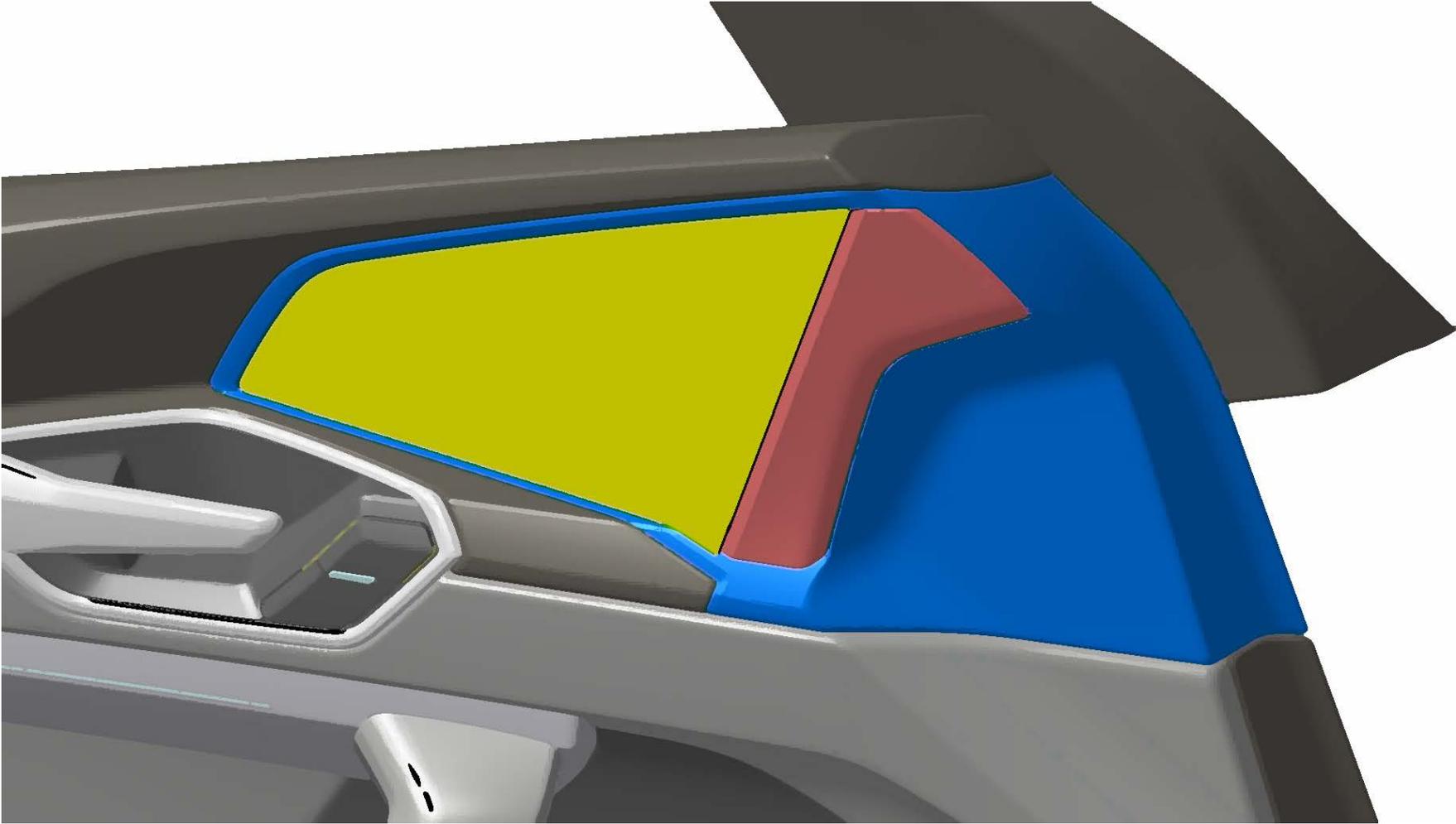


# System Component ECU

- ▶ ECU:
  - ▶ Control unit mounted on the display
    - ▶ Preparation of video data
    - ▶ HMI
    - ▶ FUSI
    - ▶ calibration
    - ▶ diagnostic
    - ▶ Etc...
  - ▶ OLED Display
    - ▶ resolution 1280x800
    - ▶ size 7"
  - ▶ Networking
    - ▶ Comfort Can



# Door Design Integration



# HMI concept

## ► Touch functions in the mirror display



### **TAP:**

- Confirmation Button



### **PINCH:**

- Zoom out of the view



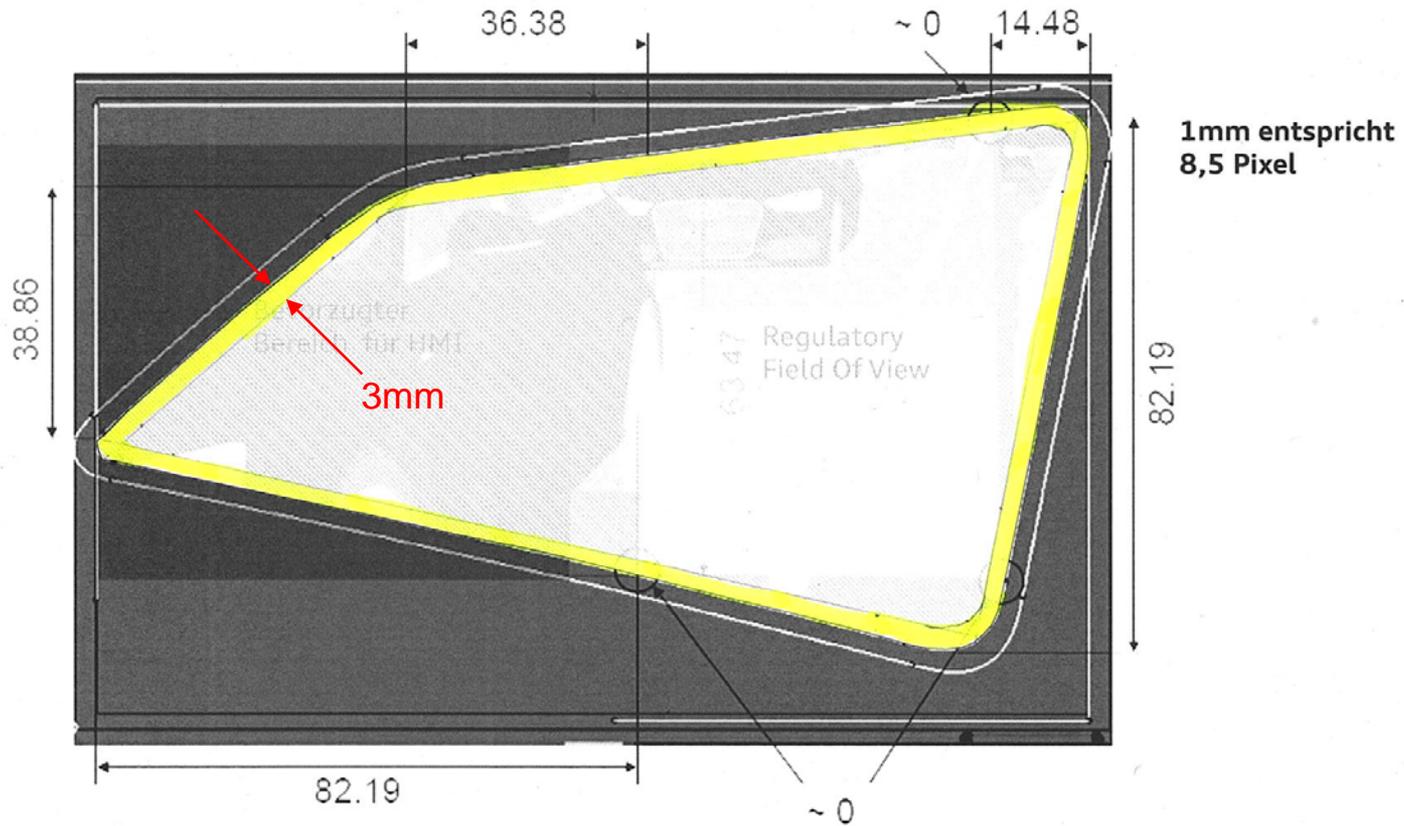
### **SPREAD:**

- Zoom in to the view

### **Drag:**

- Relocation of the view

# Sizes of Possible HMI Areas



2 Titel oder Name, Abteilung, Datum

Audi Vorsprung durch Technik 

# HMI concepts

- ▶ Description of the different views:
  - ▶ Parkview: The displayed field of view is extended downwards and zoomed in to provide a better overview when manoeuvring and parking.
  - ▶ Turnview: To reduce the blind spot during a turn, the field of view is extended to the side of the desired turn direction.
  - ▶ Motorwayview: In order to achieve a better estimation of the speeds when driving fast on the motorway, the displayed field of view is reduced and objects appear larger.

# Passenger Side Display



## Driver Side Display in Door



# Passenger Side Camera

