



Research & Vehicle Technology
“Infotainment Systems Product Development”

Feature – Video On Demand

**Infotainment Subsystem Part Specific
Specification (SPSS)**

Version 1.3

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Version Date: August 30, 2017

FORD CONFIDENTIAL



Revision History

Date	Version	Notes	
October 19, 2016	1.0	Initial Release	
May 15, 2017	1.1	Updated Release	
	VOD-FUR-REQ-238256/B-VOD Logical Signal Mapping		Update CAN signal name
	VOD-FUR-REQ-238256/B-VOD Logical Signal Mapping		Update CAN signal name
	VOD-MD-REQ-238231/B-VodSt		Update signal parameter values.
	VOD-MD-REQ-238231/B-VodSt		Update signal parameter values.
	VOD-MD-REQ-238231/B-VodSt		Update signal parameter values.
	VOD-MD-REQ-238231/B-VodSt		Update signal parameter values.
	VOD-REQ-265040/A-Decommission		New requirement
	VOD-REQ-265040/A-Decommission		New requirement
August 17, 2017	1.2	Updated Release	
	VOD-FUR-REQ-238256/C-VOD Logical Signal Mapping		TM: Update CAN signal name to CamraRearOn_D2_Stat2
August 30, 2017	1.3	Updated Release	
	VOD-REQ-238319/B-VOD Availability		Update signal name



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1 Architectural Design

1.1 Overview

The Video On Demand Feature will use the current capabilities of the Rear View Camera and vehicle display to present rear view camera image in any gear and at any speed while the engine is running.

1.2 VOD-REQ-238284/A-Video On Demand Client

Responsibility: Video On Demand (VOD) Client among its other duties that it may have is also responsible for displaying or not displaying the Rear View Camera image stream whenever the appropriate request has been delivered by the server.

1.3 VOD-REQ-238290/A-Video On Demand Server

Responsibility: Video On Demand Server will acquire user requests to turn the feature On or Off and will provide this data to the Client which will proceed as deemed appropriate.

1.4 VOD-FUR-REQ-238256/C-VOD Logical Signal Mapping

The CAN signals mentioned throughout this document shall refer to the CAN signal's logical name. The logical names shall be mapped to their actual CAN signal names. Please use the table below to perform the mapping. The InfoCAN database file is the master file for the actual CAN signal names. Note: There may be cases where the actual CAN signal name is used in this documentation.

Logical Name	CAN Signal Name
VODSt	CamraRearOn_D2_Stat2

Table: Logical name/CAN signal mapping

1.5 VOD-IIR-REQ-238232/A-VOD Server_Tx

1.5.1 VOD-MD-REQ-238231/B-VodSt

VodSt is used by the Server to send to the Client VOD State condition

Name	Literals	Value	Description
VODSt			
	NULL	0x0	Do nothing. Stay in current state.
	Deactivate	0x1	VOD is turned Off.
	Activate	0x2	VOD is turned On.
	Decommission	0x3	Decommissioned text should be displayed.



	Not Used	0x4-0x6	Empty parameters. Not used at the moment.
	Faulty	0x7	System is faulty. Error.

1.6 VOD-IIR-REQ-238235/A-VOD Client_Rx

1.6.1 VOD-MD-REQ-238231/B-VodSt

VodSt is used by the Server to send to the Client VOD State condition

Name	Literals	Value	Description
VODSt			
	NULL	0x0	Do nothing. Stay in current state.
	Deactivate	0x1	VOD is turned Off.
	Activate	0x2	VOD is turned On.
	Decommission	0x3	Decommissioned text should be displayed.
	Not Used	0x4-0x6	Empty parameters. Not used at the moment.
	Faulty	0x7	System is faulty. Error.



2 General Requirements

2.1 VOD-REQ-238319/B-VOD Availability

Video On Demand shall not be available when **Ignition_Status = OFF/ACC/Start/Unknown**.

Video On demand shall not be available if **Transmission Status (GearLvrPos_D_Actl) = Unknown**.

2.2 VOD-REQ-238329/A-Error Conditions

Client shall display "Video On Demand not available" when an error status is received by the Server.

2.3 VOD-REQ-238330/A-Missing Signal

Client shall display "Video On Demand not available" if there is no data from Server for more than 5 seconds.

2.4 VOD-REQ-265040/A-Decommission

Client should keep the feature Off state and shall display "Video On Demand not available" when decommission value is sent by the server.



3 Functional Definition

3.1 Use Cases

3.1.1 VOD-UC-REQ-238317/A-Turn on VOD

Actors	Vehicle Occupant
Pre-conditions	The infotainment system is powered on. The ignition status is Run/Start. Vehicle is in any valid gear position. Vehicle is equipped with VOD. VOD is OFF.
Scenario Description	Customer presses VOD button
Post-conditions	Client displays RVC on.
List of Exception Use Cases	
Interfaces	G-HMI Vehicle System Interface

3.1.2 VOD-UC-REQ-238318/A-Turn Off VOD

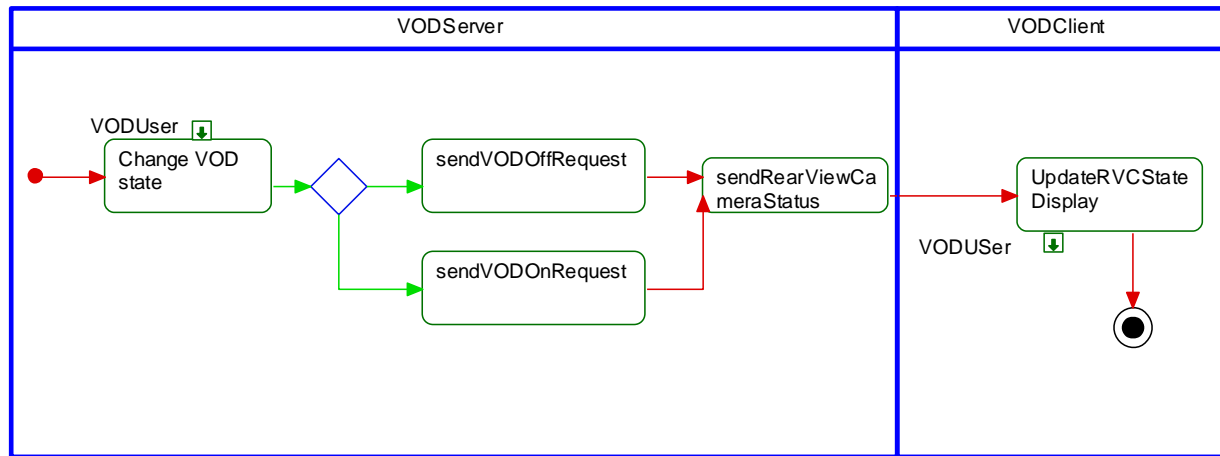
Actors	Vehicle Occupant
Pre-conditions	The infotainment system is powered on. The ignition status is Run/Start. Vehicle is in any valid gear position. Vehicle is equipped with VOD. VOD is On.
Scenario Description	Customer presses VOD button
Post-conditions	Client turns RVC OFF.
List of Exception Use Cases	
Interfaces	G-HMI Vehicle System Interface



3.2 White Box Views

3.2.1 Activity Diagram

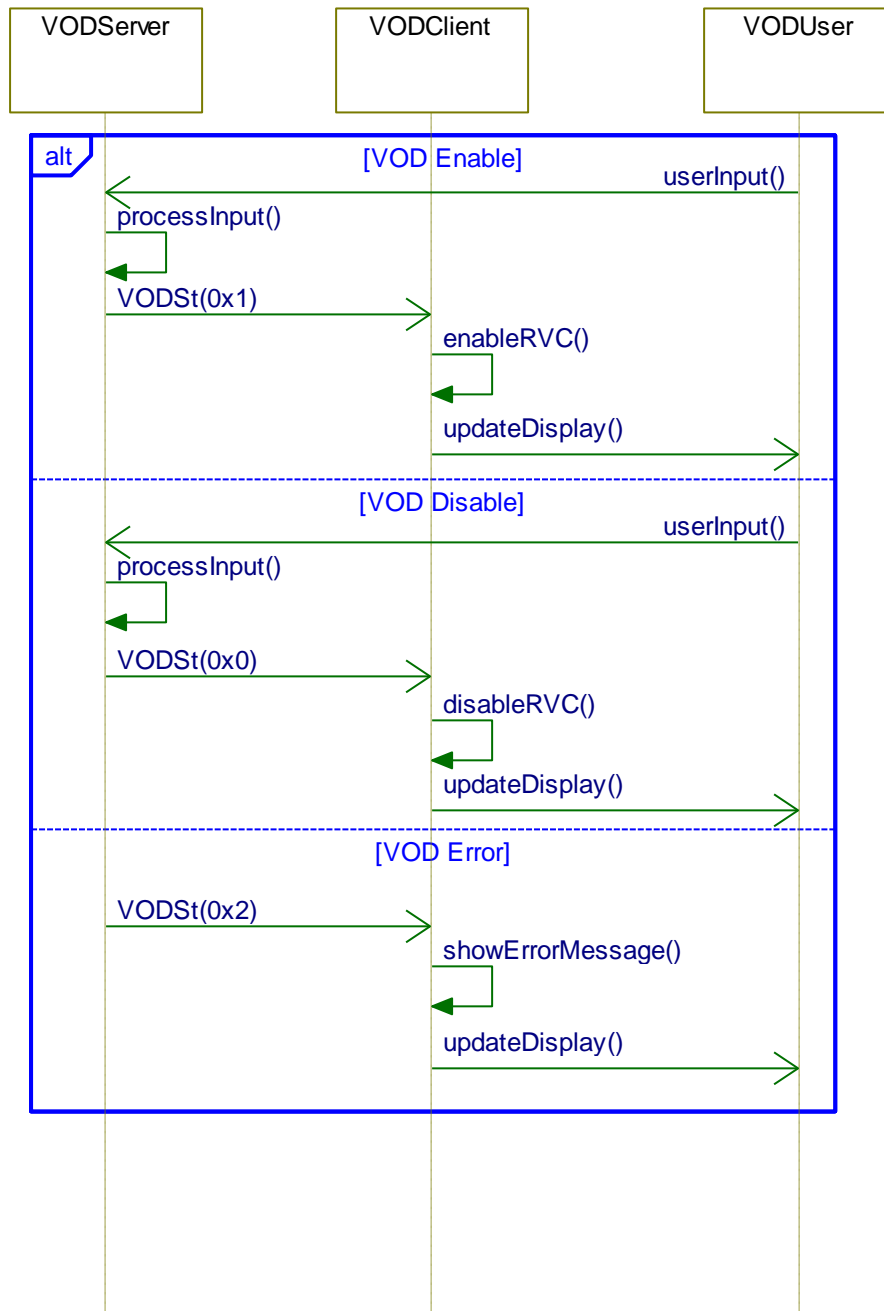
3.2.1.1 VOD-REQ-238331/A-Activity Diagram





3.2.2 Sequence Diagram

3.2.2.1 VOD-REQ-238332/A-Sequence diagram





4 Appendix: Reference Documents

Reference #	Document Title
1	
2	
3	
4	
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6	
7	
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