

Technical training.
Product information.

G30 Displays and Controls



BMW Service

Edited for the U.S. market by:
BMW Group University
Technical Training

ST1604

11/1/2016

General information

Symbols used

The following symbol is used in this document to facilitate better comprehension or to draw attention to very important information:



Contains important safety information and information that needs to be observed strictly in order to guarantee the smooth operation of the system.

Information status and national-market versions

BMW Group vehicles meet the requirements of the highest safety and quality standards. Changes in requirements for environmental protection, customer benefits and design render necessary continuous development of systems and components. Consequently, there may be discrepancies between the contents of this document and the vehicles available in the training course.

This document basically relates to the European version of left hand drive vehicles. Some operating elements or components are arranged differently in right-hand drive vehicles than shown in the graphics in this document. Further differences may arise as the result of the equipment specification in specific markets or countries.

Additional sources of information

Further information on the individual topics can be found in the following:

- Owner's Handbook
- Integrated Service Technical Application.

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The information contained in this document forms an integral part of the technical training of the BMW Group and is intended for the trainer and participants in the seminar. Refer to the latest relevant information systems of the BMW Group for any changes/additions to the technical data.

Information status: **September 2016**
Technical training.

G30 Displays and Controls

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G30 Displays and Controls

1. Control Elements

1.1. Introduction

In the BMW 5 Series, interior design, functionality and comfort have reached an even higher level. The G30 is a pioneer in intuitive operation. The continually upgraded BMW iDrive system makes a range of fascinating new vehicle comfort and infotainment features available to both the driver and the passengers.

1.1.1. New features in the G30

The G30 is largely based on the G12 in regard to the displays and controls.

The following table compares the new features and changes to the displays and controls in G30 with those in the G12:

Function	New feature/change
Controls	Turn signal/high beam switch and wash/wipe switch are designed to engage
User interface	User interface ID6 (iDrive 6th generation)
Gesture control	Extended gesture functions
Multifunction steering wheel	New installation location of the steering wheel heating button
Driving experience switch	Driving experience switch with and without ADAPTIVE mode SPORT+ mode

1.1.2. Features in common with G12

This product information only describes the differences to the G12. A detailed description of the following systems/functions can be found in the Technical Reference Manual "ST1501 G12 Complete Vehicle, Displays and Controls:

- Instrument panel
- Controller
- Central Information Display
- Gesture control
- Driving experience switch

G30 Displays and Controls

1. Control Elements

1.1.3. Overview of the interior

The following graphic provides an overview of the displays and controls of the G30:



Overview of cockpit of G30

Index	Explanation
1	Instrument panel (KOMBI)
2	Head-Up Display (HUD)
3	Central Information Display (CID)
4	Intelligent Safety button
5	Heating and air conditioning controls/radio operating unit
6	Gear selector switch (GWS)
7	Controller (CON)
8	Driving experience switch
9	Multifunction steering wheel

G30 Displays and Controls

1. Control Elements

1.1.4. Controls in center console

The following graphic shows the controls in the center console of the G30:



G30 Controls in center console

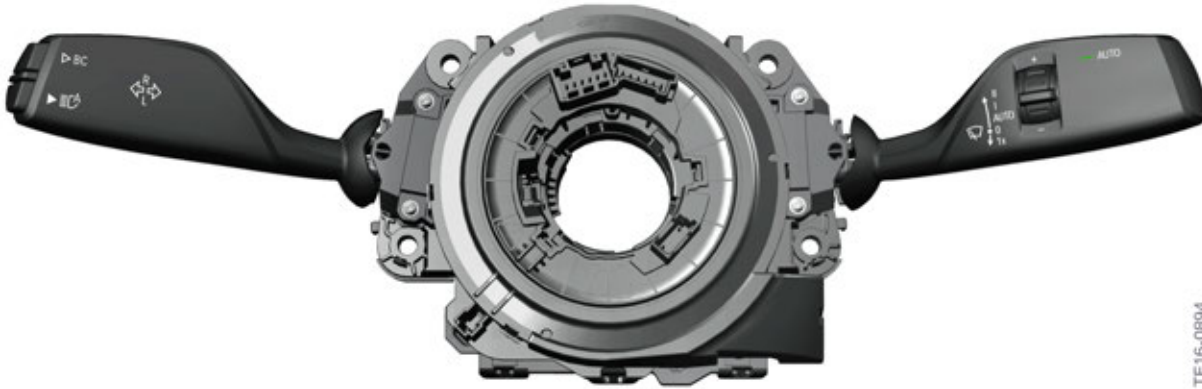
Index	Explanation
1	Gear selector switch (GWS)
2	Controller (CON)
3	Electromechanical parking brake
4	Automatic Hold
5	Surround view
6	Park Distance Control (PDC)
7	Driving experience switch
8	Dynamic Stability Control (DSC)

G30 Displays and Controls

1. Control Elements

1.2. Steering column switches

In the G30, the turn signal/high beam switch and the wash/wipe switch immediately engage when operated. The one-touch signalling and headlight flasher continue to function as before. This measure was implemented in response to customer requests. The one-touch button will gradually disappear from BMW vehicles.



G30 Steering column switches

TE16-0894

G30 Displays and Controls

1. Control Elements

1.2.1. Wash/wipe switch

The rain sensor mode is activated at the first detent position. An LED on the wash/wipe switch indicates that the rain sensor mode is activated.

Following a terminal change, the rain sensor mode is automatically activated when the vehicle travels over 5 km/h / 3 mph. The LED on the wash/wipe switch indicates that the rain sensor mode has been reactivated.

The rain sensor mode is already included in the standard equipment.



G30 Wash/wipe switch

Index	Explanation
1	Wash/wipe system settings
2	Knurled wheel (sets the sensitivity of the rain sensor mode)
3	Wash/wipe switch LED (rain sensor mode)

1.2.2. Service

To avoid damage to the wiper blades when the windscreen is iced over, the rain sensor mode is not activated at temperatures of -5 °C / 23 °F or lower until the vehicle is travelling at a speed of more than 7 km/h / 4 mph.

G30 Displays and Controls

2. Instrument Cluster

2.1. Introduction

There is only one instrument cluster available with the launch of the G30. The instrument cluster has an 8.8" TFT display and therefore allows for situation-dependent display of information that is relevant to the driver. This flexible display of information achieves a maximum degree of clarity and comfort and is used among other things for the following improvements:

- Minimization of driver distraction by optimum arrangement of related functions and situation-based displays.
- Improvement of the driving experience by the display hierarchy and design adapted to the driving situation.
- Improved driving comfort through the display of new indicating instruments and functions (e.g. picture-in-picture map display on the instrument cluster).

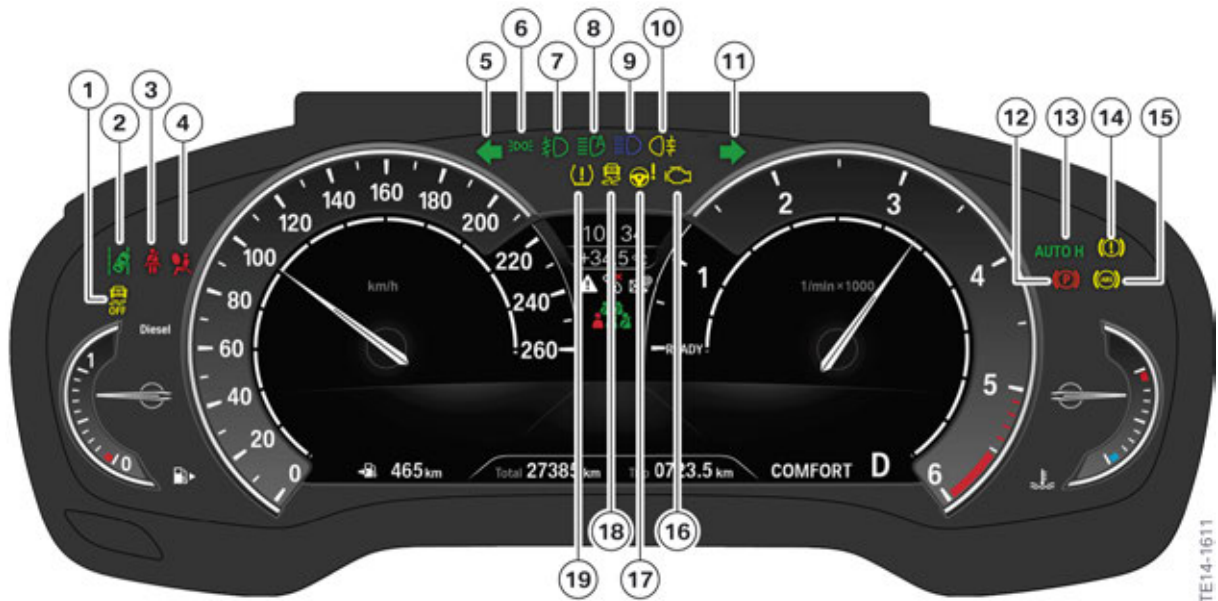


Overview of the G30 instrument cluster

G30 Displays and Controls

2. Instrument Cluster

2.2. Display



BMW 5 Series instrument cluster warning and indicator lights

Index	Explanation
1	Dynamic Stability Control deactivated; Dynamic Traction Control activated
2	Lane departure warning
3	Seat belt warning
4	Airbag warning light
5	Turn signal indicator light / Hazard warning, left
6	Side light and/or low-beam headlight active
7	Fog light
8	High-beam assistant
9	High-beam headlight
10	Fog light
11	Turn signal indicator light / Hazard warning, right
12	Parking brake
13	Automatic Hold activated
14	Brake system
15	Anti-lock Brake System (ABS)
16	Engine malfunction
17	Steering system
18	Dynamic Stability Control
19	Tire pressure control

G30 Displays and Controls

2. Instrument Cluster

2.3. Driving Modes

The displays of the instrument cluster are displayed depending on the driving mode selected. A distinction is made between the 3 following modes on the BMW 5 Series:

- Comfort
- Sport
- ECO Pro

G30 Displays and Controls

2. Instrument Cluster



BMW 5 Series driving modes on the instrument cluster

Index	Explanation
1	COMFORT mode
2	SPORT mode
3	ECO PRO mode

G30 Displays and Controls

2. Instrument Cluster

2.4. Connection

2.4.1. APIX connection

A Head Unit 2 (HU H2) is installed in the G30, the instrument cluster is connected to the head unit via an APIX line. The APIX connection is needed to show the high-quality graphic displays in the instrument cluster (navigation instructions, etc.).



G30 Navigation in the extended scope instrument cluster

2.4.2. Overview

The following graphic shows an overview of the instrument cluster connections:

Navigation System Professional (Head Unit High 2) and Head-Up Display; connection of the instrument cluster to the head unit via APIX; connection of the Head-Up Display to the instrument cluster via APIX.



G30 Connection of the instrument cluster with the head unit

G30 Displays and Controls

2. Instrument Cluster

2.5. Showroom mode

The Showroom mode enables you to view the various instrument cluster displays and the Head-Up Display during a "virtual" journey.

The Showroom mode is started via the test functions of the instrument cluster.

The following steps must be followed:

- Activate the PAD mode (press the start/stop button 3 times within 0.8 s)
- Press and hold the setting button in the instrument cluster for 10 s
- Activate the "Showroom mode" test function.

2.5.1. Test functions

There are further test functions in addition to the Showroom mode. An overview of the test functions of the G30 is provided in the following table:

Test functions	Description
01	Identification
02	System test
03	Roller test
04	Showroom mode
05	Unlock test functions
06	Fuel gauge values
07	Coolant temperature, ambient temperature
08	On-board computer average values
09	Correction factor for consumption figures

2.6. Presentation mode

The Presentation mode is used to operate the vehicle functions in showroom and trade show vehicles to demonstrate these to the customer.

This mode enables the vehicle functions to be demonstrated to and operated by the customer without a vehicle-specific ID transmitter and without starting the engine.

In addition, vehicle functions that could potentially cause damage in showrooms are deactivated. For example: Wash/wipe functions, power window or the electrical slide/tilt sunroof. If the ID transmitter is located in the vehicle interior, these functions will be operable.

The Presentation mode is activated in the service menu via the BMW diagnosis system. Furthermore, this mode is only effective in the "Residing" driving condition.

G30 Displays and Controls

3. Controller

3.1. Overview

A Touch Controller is installed in the G30:

Equipment	Controller
Navigation system Professional	7 buttons with a touch control



G30 Controller

TE16-1002

G30 Displays and Controls

3. Controller

3.2. Controller

3.2.1. Direct access keys

- Menu
- MEDIA
- COM
- MAP
- NAV
- BACK
- OPTION

3.2.2. Controller with a touch control box

The touch entry is processed in the head unit. A separate control unit Touchbox (TBX) is **not** installed.

3.2.3. Function

There are differences in how to operate the controller compared to G12:

- In the G30, double-clicking on the menu button does not open the favorites list but enlarges the view of the main menu in the CID.
- The favorites list is opened by pressing and holding the BACK button.

G30 Displays and Controls

4. Central Information Display

4.1. Overview

In the G30, a 10.25" display **with** touch operation is standard.



G30 Central information displays

The operation and functions of the 10.25" CID with touch function are identical to those in the G12.

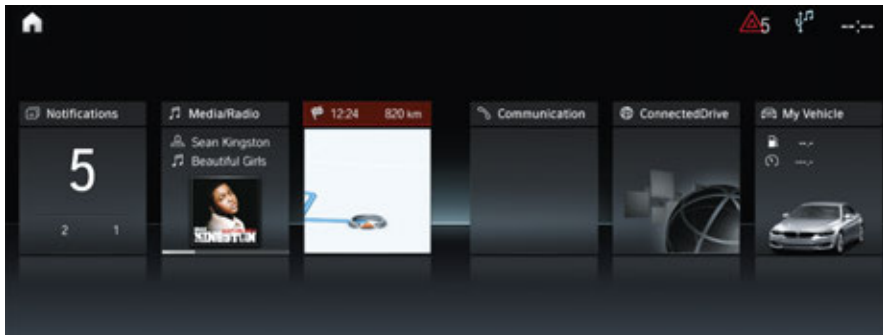
G30 Displays and Controls

5. User Interface

5.1. Introduction

The G30 contains a new user interface. It is referred to as the ID6 (BMW iDrive of the 6th generation). Marketing refers to the user interface of the G30 as the "New Interface Design".

The user interface of the G12 is referred to as the ID5. Although they have the same head unit (HU-H2), the vehicles have a different user interface. The breakdown of the individual menus is identical to the user interface of the G12.



G30 CID main menu

5.2. Innovations

5.2.1. Content of the tiles

The contents of the following tiles can be personalized:

Menu	Tile setting
Navigation	<ul style="list-style-type: none">• Map• Arrow view
On-board computer	<ul style="list-style-type: none">• Reduced on-board computer• On-board computer• Driving style analysis
ConnectedDrive	<p>Some examples are listed:</p> <ul style="list-style-type: none">• Weather• News• Wiki Local• Yelp• My News

The setting is made in the "My vehicle" menu or in the main menu by pressing the OPTION button on the controller.

G30 Displays and Controls

5. User Interface

5.2.2. Live tiles

The information on the tiles is displayed in real-time. Thus, for example, an active navigation can continue to be used in the main menu.

5.2.3. Detailed view

Double-clicking on the menu button on the controller changes the display on the main menu to three larger tiles.



G30 Detailed view of the tiles

Index	Explanation
1	View of all 6 tiles
2	Detailed view of the 3 left-hand tiles
3	Detailed view of the 3 right-hand tiles

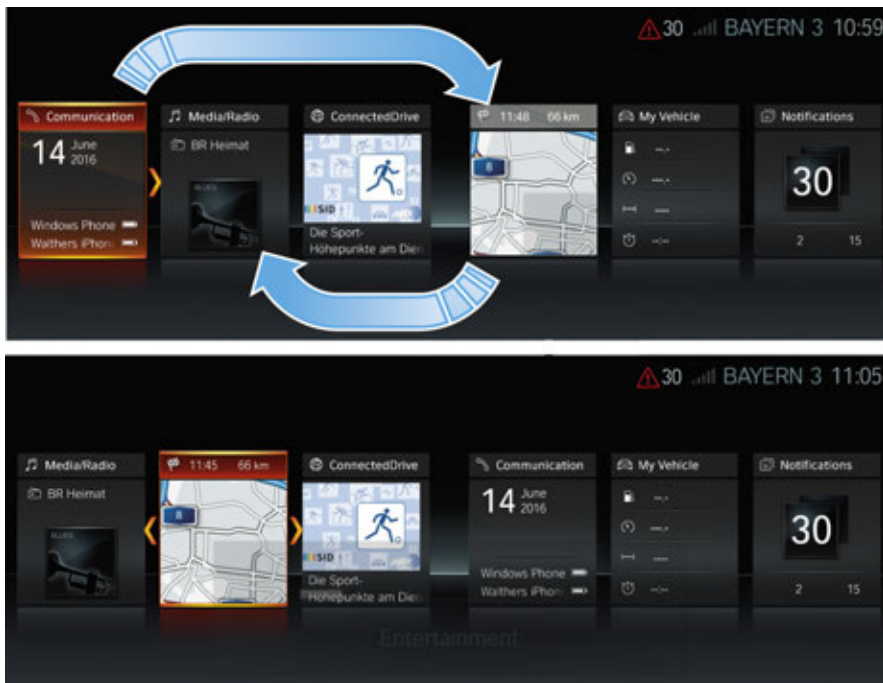
G30 Displays and Controls

5. User Interface

5.2.4. Individual arrangement

The tile arrangement is not fixed. The order of the tiles can be adjusted to individual requirements.

Now with the Head Unit High 2 (HU-H2), the tiles can be moved using the touch function similar to the method used on a smartphone.



G30 Individual arrangement of the tiles

The tiles can also be moved via the controller.



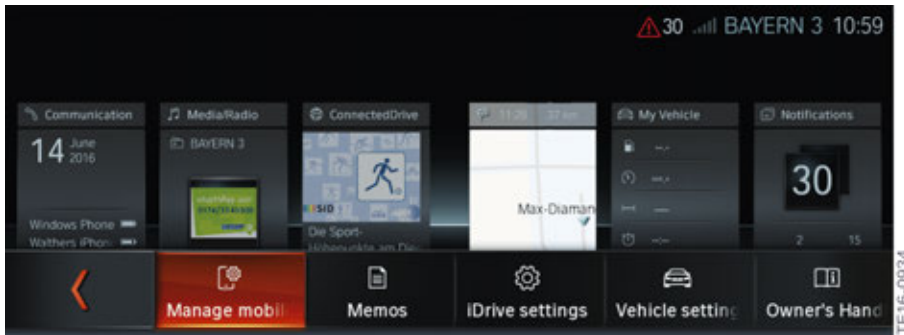
G30 Arrangement of the tiles via the controller

G30 Displays and Controls

5. User Interface

5.2.5. Favorites

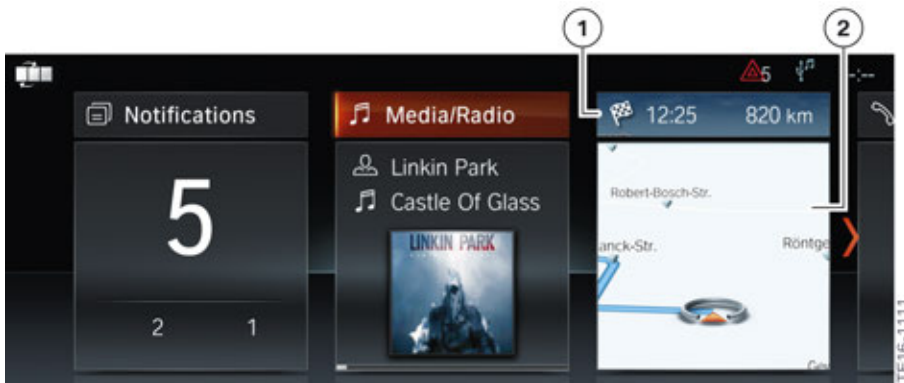
In the G12, the favorites (the last 20 menus selected) are not called up by double-clicking the menu button on the controller but by pressing and holding the BACK button on the controller. Double-clicking on the menu button on the controller changes the view in the main menu from 6 to 3 tiles (or vice versa).



G30 CID favorites

5.2.6. Direct opening

In vehicles with a CID with touch function, the displayed menu can be opened directly.



G30 Direct menu opening

Index	Explanation
1	Selecting the menu item opens the respective main menu
2	Selecting the graphic opens the displayed menu

G30 Displays and Controls

5. User Interface

5.2.7. Menu adjustment

The large number of new functions and applications can be used to configure a part of the menu. In the "Adjust menu" submenu, the lists can be individualized to obtain a better overview. Thus, the AM stations can be removed from the radio list, for example.

The following menus can be customized:

- Radio/Media
- Communication
- ConnectedDrive

Media/radio

- Stored stations
- FM
- AM
- Online Entertainment
- Music collection
- Bluetooth audio
- CD/DVD
- Screen mirroring
- USB

Communication

- BMW Assistant
- BMW Messages
- News
- Email
- Calendar
- Tasks

G30 Displays and Controls

5. User Interface

ConnectedDrive

The adjustment in the ConnectedDrive menu is country-specific due to the BMW Apps.

- ConnectedDrive Store
- BMW Assistant
- Concierge Service
- BMW Messages
- Weather
- News
- Online search
- Wiki Local

G30 Displays and Controls

6. Gesture Control


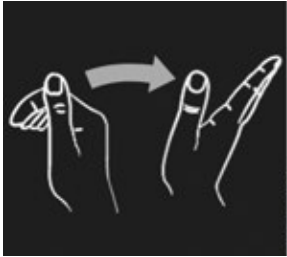
6.1. Overview

A gesture control is available as optional equipment (OE 6U8) for the G30.

The function and the detection range of the gesture camera in the roof function center (FZD) is identical to that in the G12.

6.2. Innovations

In the G30, new functions are possible for selected gestures. The previous functions have been adopted from the G12 without change. The following table lists the functions:

Gesture	Previous functions	New in the G30
 TE14-1623	<ul style="list-style-type: none">• Accept telephone call• Confirm Check Control message	Select highlighted entry from a list during voice input
 TE14-1624	<ul style="list-style-type: none">• Reject telephone call• Close pop-up window	End voice input

The remaining gestures and their functions remain unchanged. Further information on this can be found in the Technical Reference Manual for "ST1501 G12 Complete Vehicle, Display and Controls" section.

G30 Displays and Controls

7. Multifunction Steering Wheel

7.1. Overview

The buttons of the multifunction steering wheel in the G30 are unchanged compared to those in G12. Part of the assistance system is operated on the left side. Multimedia functions are operated on the right side.

The version of the control panel installed on the left side (assistance systems) depends on the equipment. The following graphic shows a multifunction steering wheel with maximum equipment:



G30 Multifunction steering wheel control panels

Index	Explanation
1	Left control panel of the multifunction steering wheel (assistance systems)
2	Shift paddles
3	Right control panel of the multifunction steering wheel (infotainment)
4	Steering wheel heating button

G30 Displays and Controls

7. Multifunction Steering Wheel

7.2. Steering wheel heating

The steering wheel heating button is no longer installed on the side of the steering wheel but is now located centrally on the spoke for easier operation.



G30 Button, steering wheel heating

G30 Displays and Controls

8. Driving Experience Switch

8.1. Overview

The functions of the driving experience switch are identical to those of the G12 except for the following.

The following table shows a comparison of the functions of the driving experience switch in a G30 and in the G12:

Mode	G30	G12
ECO PRO	X	X
COMFORT	X	X
COMFORT+	—	X
SPORT	X	X
SPORT+	X ¹	—
ADAPTIVE	X ²	X

¹⁾ Only with certain G30 models.

²⁾ Only with certain optional equipment.

The COMFORT+ mode is not offered in the G30.

8.2. SPORT+

The SPORT+ mode is selectable in the following models of the G30:

- BMW 540i
- BMW 540i xDrive
- BMW M550i xDrive (available a few months after market launch)

The SPORT+ mode influences the accelerator pedal characteristic curve, the shift points and the Active Sound Design.

G30 Displays and Controls

8. Driving Experience Switch

8.3. ADAPTIVE

The ADAPTIVE mode is not always available in the G30, it also requires the optional equipment Dynamic Damper Control (OE 223 or ZDH).

In the G30, there are two different driving experience switches, which depend on the equipment. A driving experience switch with the ADAPTIVE mode and a driving experience switch without the ADAPTIVE mode. Further information on the ADAPTIVE mode can be found in the Technical Reference Manual for “ST1501 G12 Complete Vehicle, Displays and Controls”.



G30 Driving experience switch without the ADAPTIVE mode.

8. Driving Experience Switch



G30 Driving experience switch with the ADAPTIVE mode.

G30 Displays and Controls

8. Driving Experience Switch

8.4. Individualization

In the G30, the individual modes can also be standardized or individually adjusted. This is shown in the following table:

SPORT mode	Tuning
Damping	Sport Comfort
Steering	Sport Comfort
Engine	Sport+ Sport Comfort
Transmission	Sport Comfort
Backrest width adjustment	Driver and front passenger (only with multi contour seat (OE 456))



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