RAD2+ Radio: Background Noise with Audio Turned Off

MODEL

E82 (1 Series Coupe)

E88 (1 Series Convertible)

E89 (Z4)

E90 (3 Series Sedan)

E91 (3 Series Sports Wagon)

E92 (3 Series Coupe)

E93 (3 Series Convertible)

With option 663 (Radio BMW Professional, RAD2+) and option 676 (HiFi Loudspeaker System)

SITUATION
Background noise (buzzing, crackling, static) can be heard:

- At low audio volume

- When the radio is turned off

- When the ignition is turned off

NOTE: Background noise stops when the radio enters sleep mode.

IMPORTANT: Background noise is more noticeable on vehicles produced before 09/2009 in case a RAD2+ replacement radio was installed previously.

CAUSE
RAD2+ radio concept, manufactured from July 2009 to February 2014

CORRECTION

1. Perform diagnosis using ISTA and diagnose any faults related to the above situation. Follow the test plan recommendations.

   Always connect a BMW approved battery charger/power supply (SI B04 23 10).

2. Only replace the radio if no relevant faults are stored.

3. Program the vehicle using ISTA/P 2.52.1 or later.

   New integration level: E89x-14-03-500 or higher

Note that ISTA/P will automatically reprogram and code all programmable control modules that do not have the latest software.

For information on programming and coding with ISTA/P, refer to CenterNet / Aftersales Portal / Service / Workshop Technology / Vehicle Programming.

Part Number	Description	Quantity
Refer to the EPC,	RMFD radio BMW Professional CD, RAD2+	1
VIN-specific		

Covered under the terms of the BMW New Vehicle/SAV Limited Warranty.

Defect Code:	65 12 69 02 00	
Labor Operation:	**Labor Allowance:**	**Description:**
00 00 006	Refer to KSD2	Performing "vehicle test" (with vehicle diagnosis system – checking faults)
and		
61 21 528	Refer to KSD2	Connect an approved battery charger/power supply (indicated in KSD2 as "Charging battery")
and		
65 11 581	Refer to KSD2	Replacing radio receiver (after diagnosis, without programming/encoding)
61 00 710	Refer to KSD2	Programming/encoding control unit(s) (not including CAS)
or		
61 00 720	Refer to KSD2	Programming/encoding control unit(s) (with CAS)

Labor operation code 00 00 006 is a Main labor operation. If you are using a Main labor code for another repair, use the Plus code labor operation 00 00 556 instead.

Refer to KSD2 for the corresponding flat rate unit (FRU) allowance. Enter the Chassis Number, which consists of the last 7 digits of the Vehicle Identification Number (VIN). Click on the "Search" button, and then enter the applicable flat rate labor operation in the FR code field.

If a control module fails to program correctly or initializations are required, the additional work must be claimed with separate labor operations under the defect code listed above, refer to KSD2.

Other Repairs

If performing other ISTA diagnostics and the related test plans results with **eligible and covered work,** claim this work with the applicable defect code and labor operations listed in KSD2.