



## ***RF Exposure Evaluation Report***

***For Check-Cap Ltd.***

***Equipment Under Test:***

***C-Scan Cap transceiver***

***Model: 100075-00***

***From The Standards Institution  
Of Israel  
Industry Division  
Electronics & Telematics Laboratory  
EMC Branch***



***Certificate Number: AT-1359***



## 1. Applicant information

Applicant:	Check-Cap Ltd.
Address:	Aba Hushi 29 Ave., POB 1271, Isfiya, Israel
Sample for test selected by:	The customer
The date of tests:	22 July, 13 August 2018

## Equipment under test information

Description of Equipment Under Test (EUT):	C-Scan Cap transceiver.
Model:	100075-00
Software version of radio unit:	3.2.0
Hardware version:	06
Manufactured by:	Check-Cap Ltd.

## 2. Test performance

Location:	SII EMC Section
Purpose of test:	To prove the safety of radiation harmfulness to the human body for our product
Test specifications:	FCC KDB 447498 D01 General RF Exposure Guidance v06

This Test Report contains 4 pages and may be used only in full.	This Test Report applies only to the specimen tested and may not be applied to other specimens of the same product.
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## 3. Summary of test:

Using the general SAR test exclusion guidance in Section 4.2.4 of KDB 447498 D01 v06, we show the device meeting the SAR exemption.

Electronics and  
Telematics Laboratory

February 7, 2018

Name: Eng. Yuri Rozenberg  
Position: Head of EMC Branch.

Name: Michael Feldman.  
Position: Test engineer.



#### 4. Equipment under test description.

\*The applicant provided description.

##### 4.1 General description

The EUT, C-Scan Cap, is a standalone application used for acquiring data from human colon to analyze and identify polyps. EUT comprises the 433.5 MHz transceiver module. C-Scan Cap powered by three 1.5v Silver Oxide coin batteries. Upon startup Cap, transmit RF packets utilizing low output power of the integrated RF transceiver. Internal Cap algorithm detects entry to human body and switches the RF operation to higher output power.

Type of modulation:	GFSK
Antenna type:	Internal integrated. Gain (-14) dBi.



## 5. FCC KDB 447498 D01 – General SAR Test Exclusion Guidance

According to the KDB 447498 D01 Section 4.2.4, implanted transmitter is exempted from RF exposure requirement when the transmitting power is  $< 1.0$  mW;

“When the aggregate of the maximum power available at the antenna port and radiating structures of an implanted transmitter, under all operating circumstances, is  $\leq 1.0$  mW, SAR test exclusion may be applied.<sup>27</sup> The maximum available output power requirement and worst case operating conditions must be supported by power measurement results, based on device design and implementation requirements, and fully justified in a SAR analysis report according to KDB Publication 865664 D02, in lieu of SAR measurement or numerical simulation.”

### SAR Test Exclusion Threshold

Freq. [GHz]	Meas. Configuration	Max. E-Field @ 3m (dB $\mu$ V)	EIRP ( $\mu$ W)	Limit (mW)	Result
0.4335	Inside Body	35.1	0.0009	$< 1.0$	Exempted *
0.4335	Outside Body	46.0	0.012	$< 1.0$	Exempted *

Note:

1. Since EUT can operate as an implanted device, the measured field strength used to calculate for maximum output power.
2. Field strength was measured inside the body simulated liquid and outside without any solution.

**Summary:** (\*) EUT is exempted from RF exposure requirement.