

**SMARTAMP**

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**UNITRON**  
GROUP



An illustration of a smart home and communication infrastructure. On the left, a modern house with a brown roof and large glass windows is shown. A small antenna is mounted on the roof, with a white line connecting it to a larger antenna on a tower in the background. The background features stylized green trees, a blue sky, and a green ground plane. The text 'SMARTAMP' is prominently displayed in the upper right, with 'SMART' in white and 'AMP' in orange. Below it, a white box with an orange border contains the text 'PRODUCT INTRODUCTION'.

# SMARTAMP

**PRODUCT INTRODUCTION**

# TRADITIONAL INSTALLATION

CH22

CH23

~~CH22 + CH23~~

SPLITTER

- Channels with same Channel Number are lost
- Poor isolation between adjacent channels
- Signal quality issues
  - Lots of interruptions
  - Loss of 4dB (min) when combining antenna

# SMART AMP INSTALLATION



Combining 2, 3 or 4 antenna  
for full HDTV reception has  
never been so easy

**Johansson**  
the original

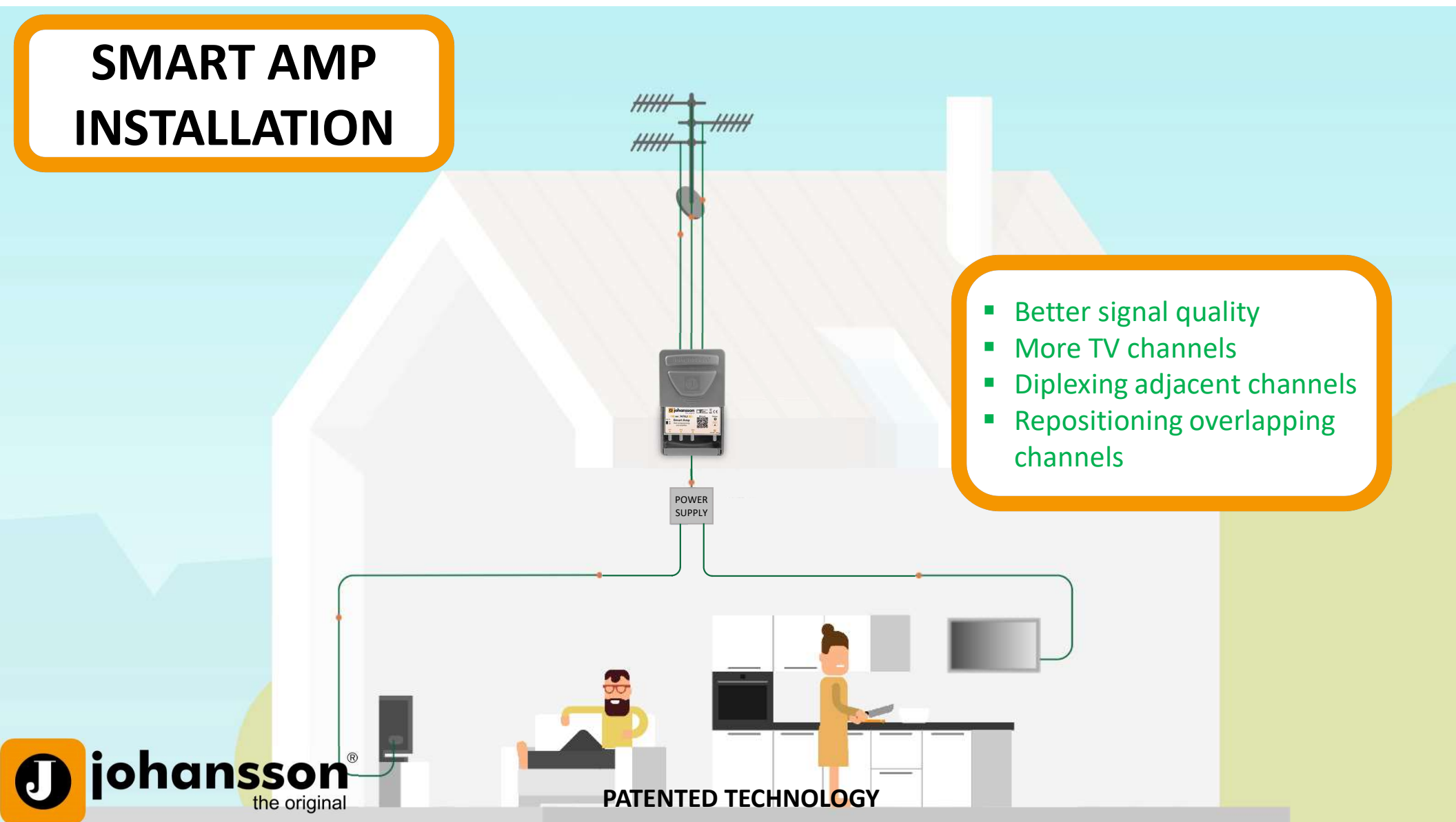
PATENTED TECHNOLOGY

# SMART AMP INSTALLATION

- Better signal quality
- More TV channels
- Diplexing adjacent channels
- Repositioning overlapping channels

**J** **johansson**<sup>®</sup>  
the original

PATENTED TECHNOLOGY



# HOW IT WORKS



- Autoscane
- 360° OTA reception
- DVB-T/T2 ATSC ISDB-T
- 4G/5G resilient





# SMARTAMP

## PRODUCT SPECIFICATIONS

## 4 MODELS



**7473L1**  
3 INPUTS  
4G



**7473L2**  
3 INPUTS  
5G



**7474L1**  
4 INPUTS  
4G



**7474L2**  
4 INPUTS  
5G



# FEATURES

- Scans all channels, amplifies the weak signals while keeping the strong channels
- All output channels have an equal and stable output power
- Treats even the most difficult situations with adjacent channels
- Channels with the same frequency can be amplified in and re-located to the LTE band (switchable feature)
- Fully automatic channel scan and process function upon start-up



# FEATURES

- Fully automatic recognition of the applied country channel plan
- SAW filters for LTE (4G or 5G) rejection on all inputs
- Outdoor weatherproof mast-head housing
- DC Power over coax
- All ports ESD protected



# SPECS

Parameter	Unit	KIT7473L1	KIT7474L1	KIT7473L2	KIT7474L2
Inputs	-	3	4	3	4
LTE rejection	-	4G (>CH60)	4G (>CH60)	5G (>CH48)	5G (>CH48)
Channel plan	-	VHF BIII + UHF Automatic channel plan selection			
LTE band rejection	dB	>40			
Output	-	1			
Output Power	dBμV	85			
Frequency range	MHz	174 - 862			
LTE band Re-use	-	L1 = CH61-69 (790MHz-862MHz) Switch ON-OFF		L2 = CH49-69 (694MHz-862MHz) Switch ON-OFF	
Adjacent channel isolation	dB	>35			
Input sensitivity	dBμV	minimum 40			
Power	-	12V/300mA (DC over coax) (350mA - 4 in)			
Power Supply	-	External power supply (ref. 2437 - 2 out)			
Dimensions	mm	120 x 115 x 50			
Operating temperature	°C	-20 to +50			

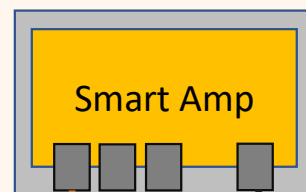
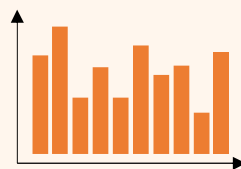
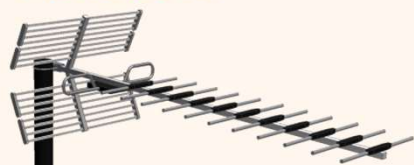


# SMARTAMP

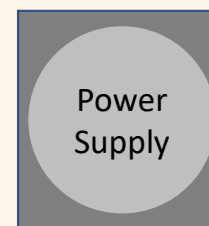
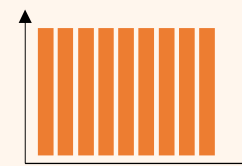
**PRODUCT INSTALLATION**

# 1 ANTENNA

ANTENNA 1

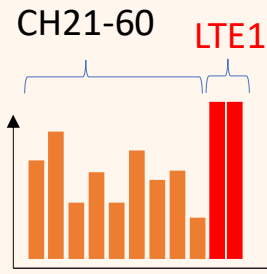


DC

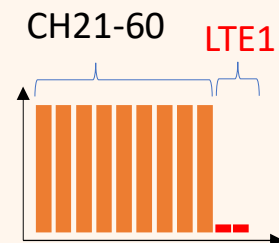
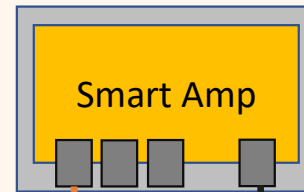


# LTE1

ANTENNA 1



REF. 7473L1



Power Supply

DC

**LTE1 = LTE800 = 4G**  
Everything above  
790MHz is filtered out

TV1

TV2

PATENTED TECHNOLOGY

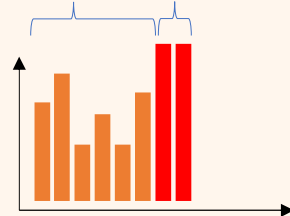


# LTE2

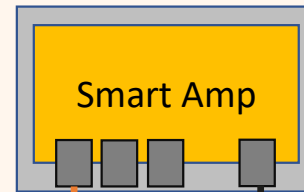
ANTENNA 1



CH21-48 LTE2

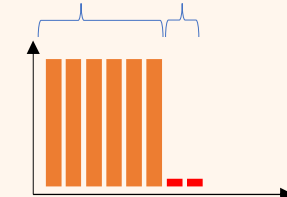


REF. 7473L2

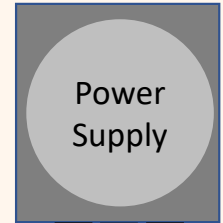


DC

CH21-48 LTE2



Power Supply



**LTE2 = LTE700 = 5G**

Everything above  
694MHz is filtered out

TV1



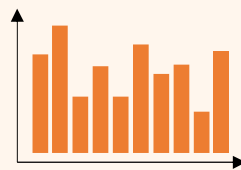
TV2



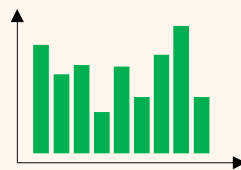
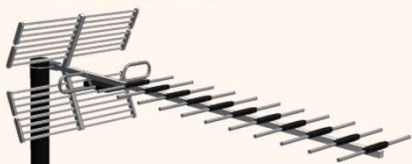
PATENTED TECHNOLOGY

# 3 ANTENNA

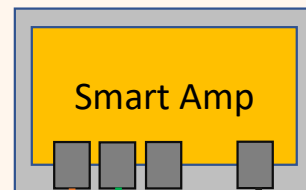
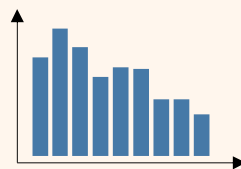
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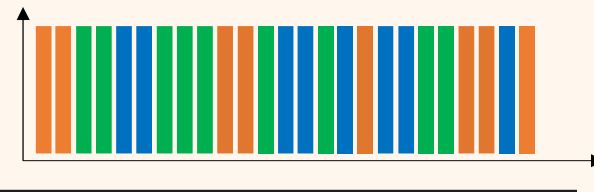
ANTENNA 2



ANTENNA 3

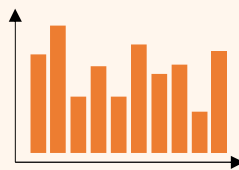


DC

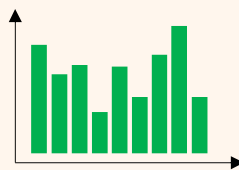
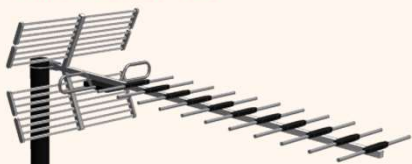


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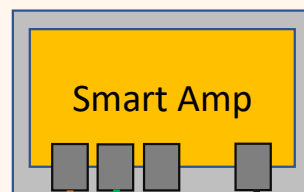
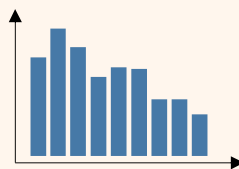
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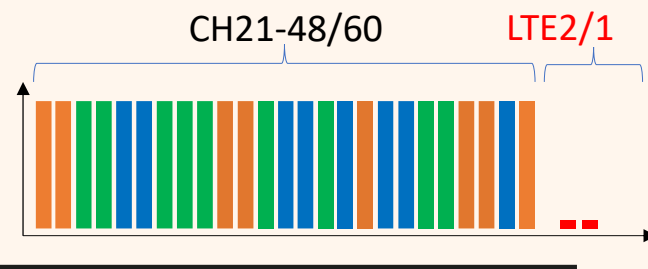
ANTENNA 2



ANTENNA 3



DC

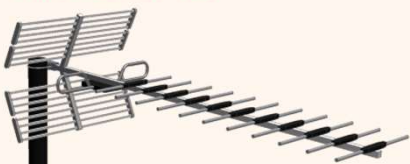


# CONVERSION ON

ANTENNA 1



ANTENNA 2



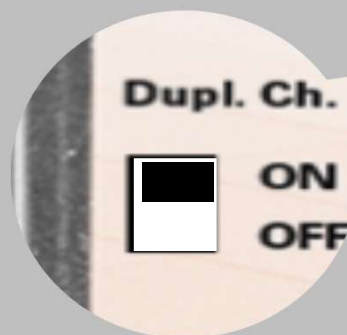
ANTENNA 3



Duplicate channel feature ON

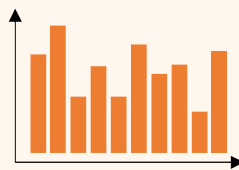
CH21-48/60

LTE2/1

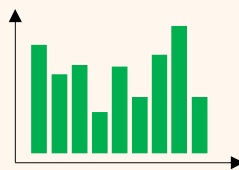
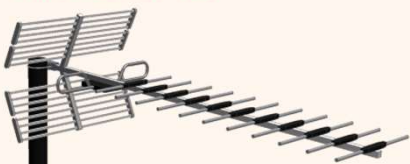


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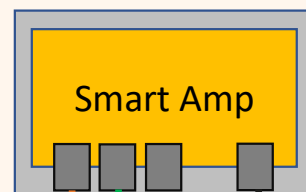
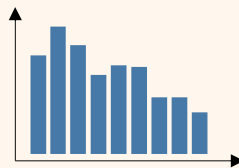
ANTENNA 1



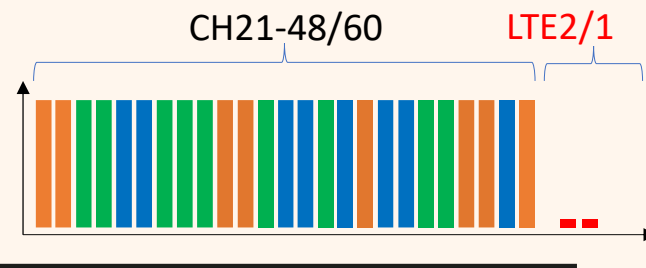
ANTENNA 2



ANTENNA 3



DC

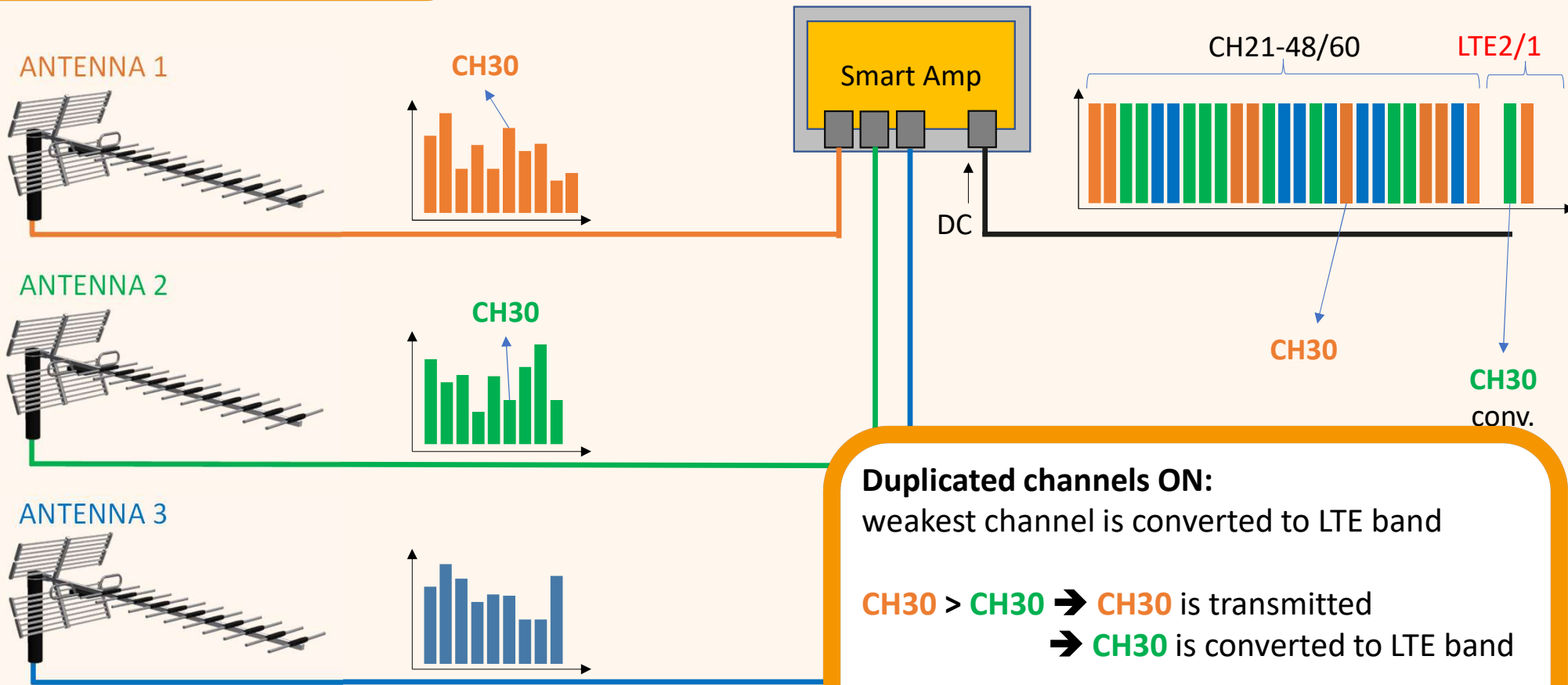


## DUPLICATED CHANNELS IN LTE BAND

**4G:** 62 – 64 – 66 - ... in steps of 2,  
then 61 – 63 –...

**5G:** 50 – 52 – 54 - ... in steps of 2,  
then 49 – 51 – ...

# CONVERSION ON



## Duplicated channels ON:

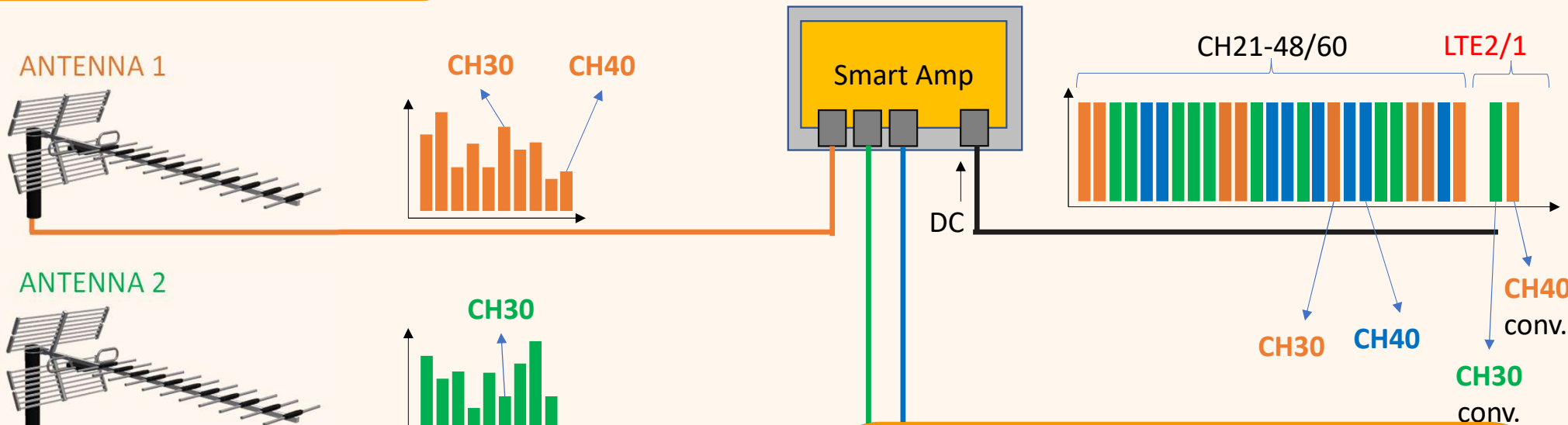
weakest channel is converted to LTE band

**CH30** > **CH30** → **CH30** is transmitted

→ **CH30** is converted to LTE band



# CONVERSION ON



## Duplicated channels ON:

weakest channel is converted to LTE band

- $CH30 > CH30 \rightarrow CH30$  is transmitted  
 $\rightarrow CH30$  is converted to LTE band
- $CH40 < CH40 \rightarrow CH40$  is converted to LTE band  
 $\rightarrow CH40$  is transmitted

# CONVERSION OFF

ANTENNA 1



ANTENNA 2



ANTENNA 3



Duplicate channel feature OFF

CH21-48/60

LTE2/1



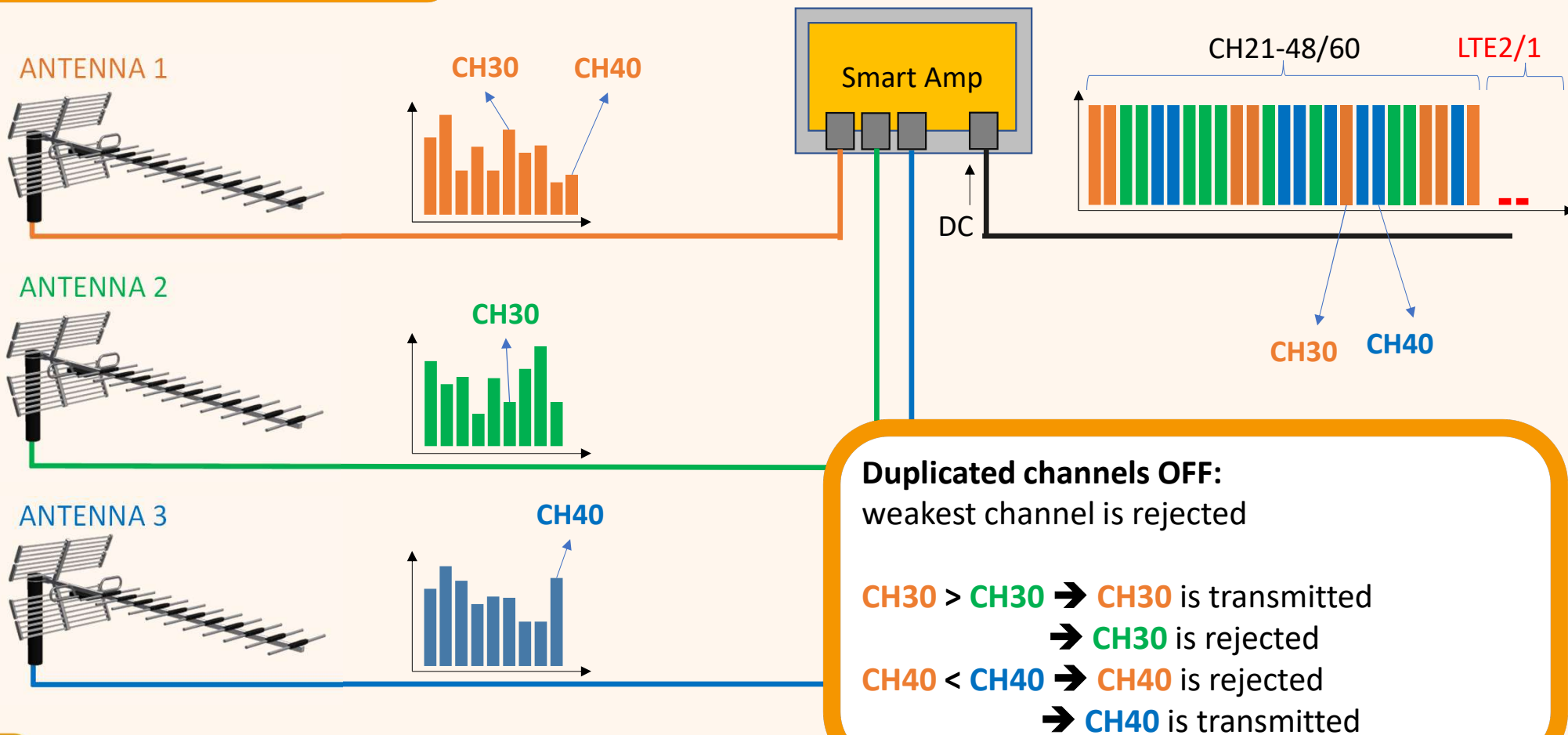
Dupl. Ch.

ON

OFF



# CONVERSION OFF



# AUTOSCAN

## PLUG-AND-PLAY

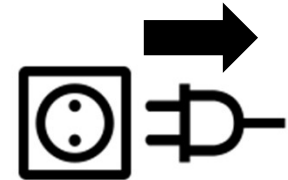
Plug in Power Supply

Status LED will blink when scanning

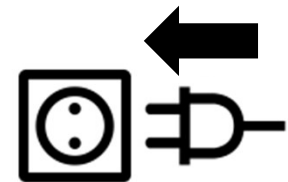
Status LED solid when autoscan ready  
This can take up to 20 seconds

## FORCE CHANNEL SCAN = RESET = REPROGRAM

Unpower



Repower within 4 sec



Status LED will blink when scanning

If power interruption (>4 sec)  
= no reprogram = settings are kept



# SMARTAMP

**CONCLUSIONS**

More terrestrial TV + Better signal quality





# GET YOUR JOHANSSON SMART AMP NOW!

[sales@unitrongroup.com](mailto:sales@unitrongroup.com)



 **johansson**<sup>®</sup>  
the original

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