



# Stand alone headend 16 channels 8PSK/QPSK to 16 QAM transmodulators

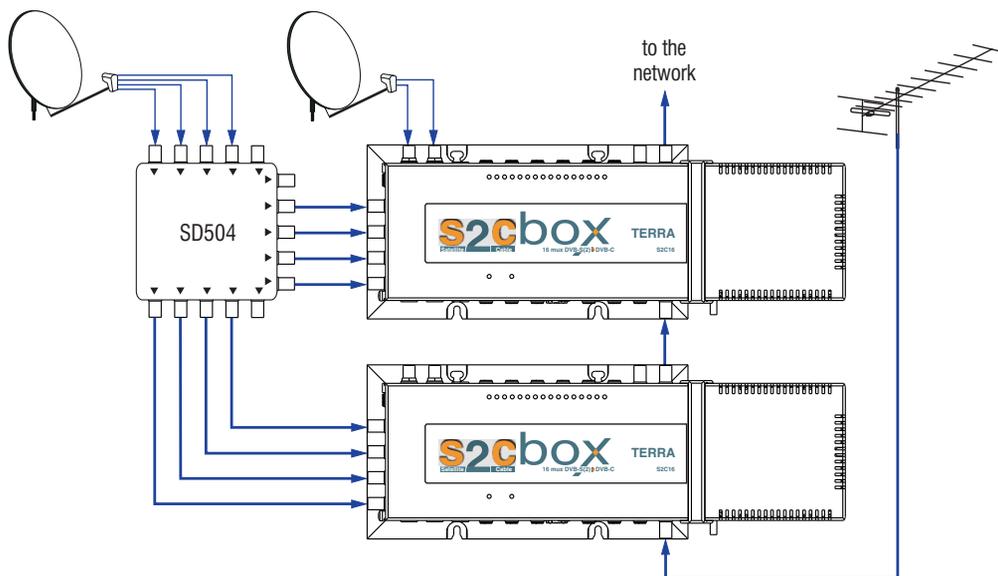
**S2Cbox** - micro processing unit of 37x14x7 cm only, which allows distribution of satellite TV programs using the existing in house coaxial network structure. Any output channel from 48 MHz to 858 MHz can be selected and adjusted independently. Fanless solution with extremely low power consumption - 30 W only for 16 SAT transponders processing is implemented in robust die-cast housing. Web-based control of the headend makes easy setup and configuration.

Remote control and SW upgrade, SNMP monitoring, save and load configuration file, PW protected control panel for multiple users and more functions are available.

- **S2C16** - 16 channel transmodulator
- **S2C16P** - 16 channel transmodulator with powering redundancy



Application example of processing from 32 SAT transponders to 32 DVB-C channels and combining of terrestrial TV.



SD504 - 2 way splitter, see [www.terraelectronics.com](http://www.terraelectronics.com)



# Stand alone headend

# 16 channels 8PSK/QPSK to 16 QAM transmodulators

Converting of 16 DVB-S/S2 8PSK/QPSK modulated SAT IF multiplexes into 16 QAM modulated DVB-C RF channels.

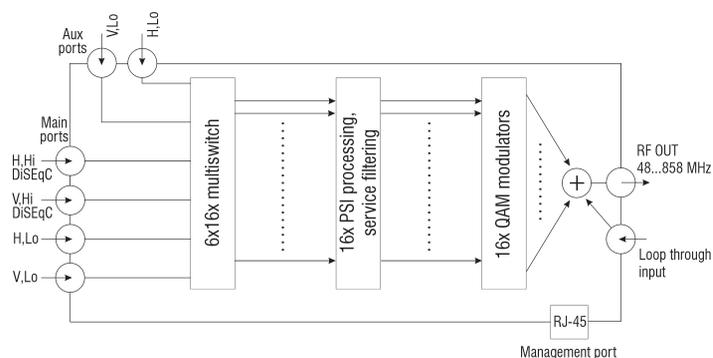
- built-in redundancy power supply with 2 separated mains leads (S2C16P)
- 6 SAT IF inputs
- TS processing: PCR restamping, service filtering, PSI/SI regeneration, NIT generation, PMT version monitoring
- SNMP traps
- die-cast housing
- connectors: RF input & output, output test point - type F, Web based control - RJ-45



Technical specifications		S2C16 / S2C16P	
TYPE			
<b>Ordering number</b>		03817 / 03824	
<b>Number of channels</b>		16	
<b>RF input</b>	frequency range	6x (950 - 2150 MHz)	
	level AGC range/impedance	45-85 dBμV/75 Ω	
	LNB powering/control	DiSEqC max. 500 mA +250 mA / 13 V/18 V, 22 kHz	
	modulation	<b>DVB-S demodulator (QPSK)</b>	<b>DVB-S2 demodulator (QPSK, 8PSK)</b>
	symbol rate	2 ÷ 45 MS/s	2 ÷ 45 MS/s (QPSK), 2 ÷ 31.5 MS/s (8PSK)
	code rate	1/2, 2/3, 3/4, 5/6, 7/8	QPSK 1/2, 3/5, 2/3, 3/4, 4/5, 5/6, 8/9, 9/10 8PSK 3/5, 2/3, 3/4, 5/6, 8/9, 9/10
	roll off	35 %	20 %, 25 %, 35 %
	signal processing	ETSI 300 421	ETSI 302 307
<b>RF output</b>	frequency range	48 - 858 MHz, by step 100 kHz	
	channel allocation	independent	
	output level per carrier/impedance	90 dBμV/75 Ω	
	total output level adjustment	15 dB by 0.5 dB step	
	carrier output level adjustment	+3 dB...-3 dB by 0.5 dB step	
	loop through frequency range/loss	45-862 MHz/3 dB	
	MER	≥ 43 dB	
	modulation DVB-C	QAM16, QAM32, QAM64, QAM128, QAM256	
	channel bandwidth / symbol rate	4...8.3 MHz / 3.5 ÷ 7.2 MS/s	
	return loss	≥ 14 dB	
roll off	15 %		
signal processing	EN 300 429, ITU-T J.83 A (Annex A)		
test point	-20 dB		
<b>Input data rate</b>		max. 90 Mbps per channel	
<b>Management port</b>		10/100 Base-T Ethernet	
<b>Power consumption*</b>		230 V~ 50/60 Hz up to 29 W	
<b>Operating temperature range</b>		-10° ÷ +55° C	
<b>Dimensions/Weight (packed)</b>		373x135x69 mm / 3.1 kg (S2C16); 492x135x69 mm / 3.54 kg ( S2C16P)	

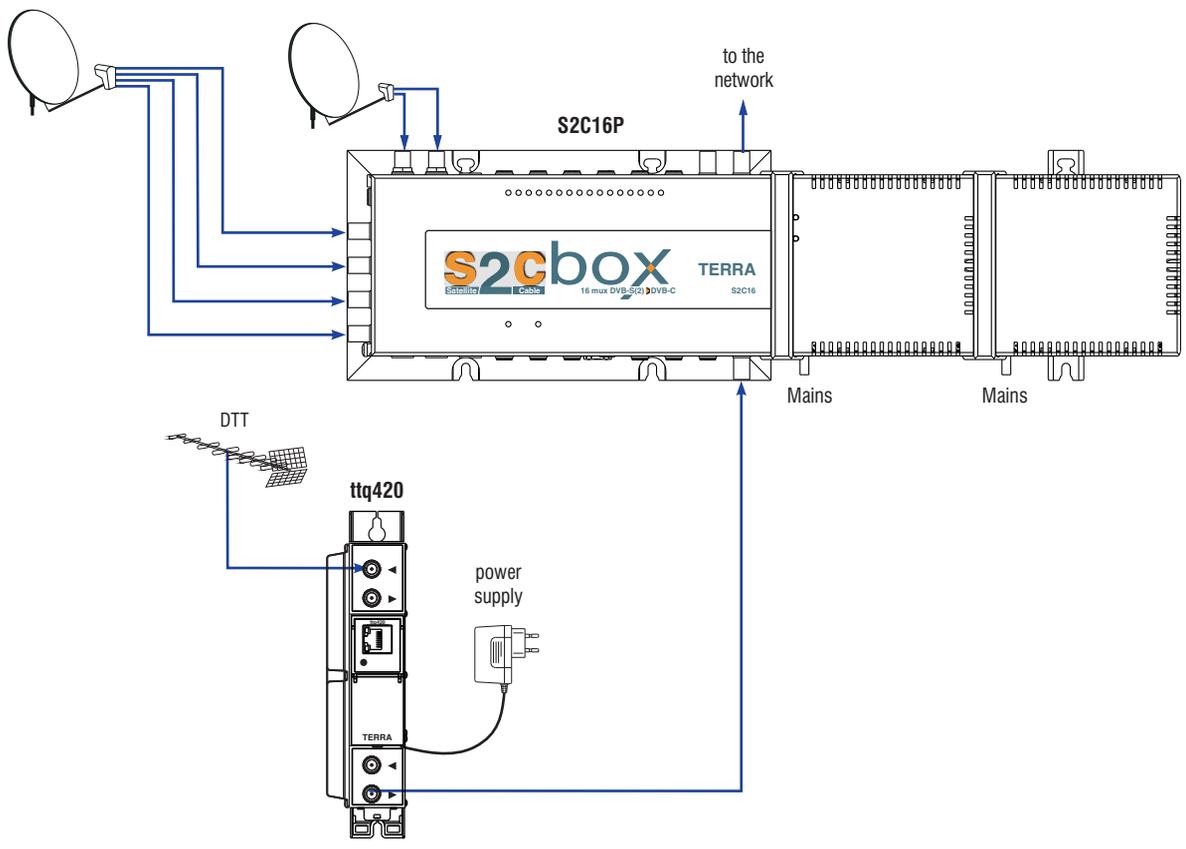
pr. software control

\* without external DC load;  
with maximal external DC load 44 W



# Stand alone headend Application diagram

- Application example of processing from:
- 16 SAT transponders of 2 satellites to DVB-C channels
  - 4 DTT channels to DVB-C channels



ttq420 - twin digital transmodulator