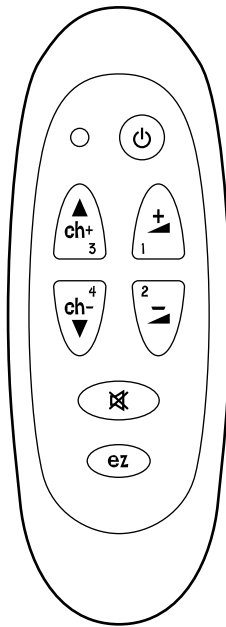


Ⓒ **Universal Remote Control**

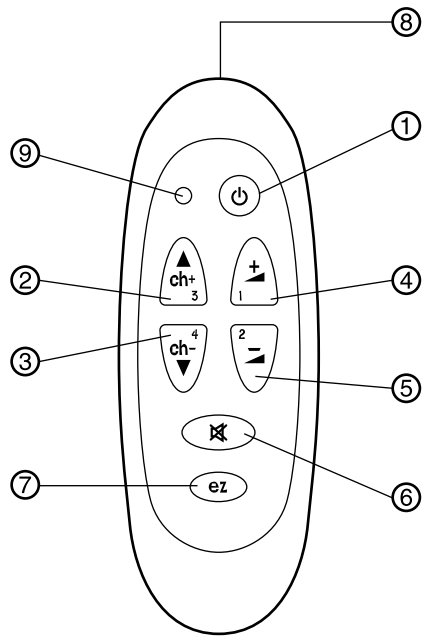
Ⓘ **Telecomando Universale**

BC-101E



Instruction Manual
Istruzioni per L'uso





1. Power Key
Tasto di Alimentazione

6. Mute Key
Tasto Silenziamento

2. Channel Up and No.3 key**
Tasto Canale avanti e Tasto Nr. 3**

7. CODE Key for setup
Tasto per la configurazione del telecomando

3. Channel Down and No.4 key**
Tasto Canale indietro e Tasto Nr. 4**

8. IR Transmitter
Finestra di Emissione

4. Volume Up and No.1 key**
Tasto Volume alto e Tasto Nr. 1**

9. LED Indicator
Luce rossa LED

5. Volume Down and No.2 key**
Tasto Volume basso e Tasto Nr. 2**

** Keys of 1, 2, 3, and 4 for code/command entering.
** Tastos 1, 2, 3, e 4 per definire il codice.



Thank you for purchasing the **BC-101E** TV universal remote control. Before you can use your new remote, you will need to program it to operate the specific TV equipment you wish to control. Simply entering proper device codes for your equipment and it is ready to use.





■ BATTERY INSTALLATION / CHANGE

1. On the back of the **BC-101E**, pull the battery compartment cover.
2. Insert two (2) AAA new **Alkaline** batteries.
3. Match the (+) and (-) poles correctly aligned into the battery compartment.
4. Close the battery compartment.


NOTE : Removing the batteries for more than 2 minutes will require you to reprogram your remote.


■ SETTING UP BY DIRECT ENTRY

To program your **BC-101E** to operate your TV :

1. Turn on your TV.
2. Press & hold the **EZ**  key, then press & hold the **POWER**  key for 2 seconds.
3. Release from the **EZ**  and **POWER**  key, now the red LED light on.
4. Enter the 5-Digit TV code from the code list for your brand equipment.















* If you perform this procedure correctly, the red LED light will go out. Otherwise, the red LED flashes 2 times.

5. Aim the **BC-101E** at your TV and press **POWER**  key. Your TV should turn off. If none of the keys or only some of the keys operate your TV, repeat Steps 2-4, trying each code listed for your brand until you find the one that operates your TV.
6. Your **BC-101E** is now programmed to operate your TV. Write down your TV code on the label at the back of the **BC-101E** for future reference.

NOTE : To leave the **SETUP** during the code entering, just press any of the  keys once. In other case, if no code entering within 10 seconds, the red LED light will go out automatically.

■ SETTING UP BY EASY (MANUAL) SEARCH

This easy search method checks all its preprogrammed codes to find the code that will operate your equipment automatically. This method may take a few minutes.









1. Turn on your TV.
2. Aim the **BC-101E** at your TV.
3. Press & hold the **EZ**  key, then press & hold the **POWER**  key for 2 seconds.
4. Release from the **EZ**  and **POWER**  key, now the red LED light on.
5. Enter the command code of   .
6. Press & release the **POWER**  key again, the red LED will blink quickly to indicate Easy (Manual) Search mode is on.
7. Aim the **BC-101E** at your TV, then press & release the **POWER**  slowly until the TV turns off.
8. If the TV turn off, this indicates that the **BC-101E** is now set to your TV. Press the  key to lock up the code and return to the normal mode.
9. To check the code, press the **CH+/-**  , **VOL+/-**   for operation. If no function, repeat Step 3 for next search.
10. Your **BC-101E** is now programmed to operate your TV.



11. In other case, if no code entering within 30 seconds, the red LED light will go out automatically.
















■ SETTING UP BY AUTOMATIC SEARCH

This automatic search method checks all its preprogrammed codes to find the code that will operate your equipment. This method may takes a short time.

1. Turn on your TV.
2. Press & hold the **EZ**  key, and then press & hold the **VOL +**  or **VOL -**  key for 2 seconds.
3. Release from the **EZ** , **VOL +**  or **VOL -**  key, the red LED light on to indicate the AUTO search mode is enabled.
4. Aim the **BC-101E** at your TV until the TV turns off.
5. If the TV turns off, this indicates that the **BC-101E** is now set to your TV. Press any key to lock up the code and return to the normal mode.
6. To check the code, press the **CH+/-** , **VOL+/-**  for operation. If no function, repeat Step 2 for next search.
7. Your **BC-101E** is now programmed to operate your TV.
8. In other case, if no code entering within 30 seconds, the red LED light will go out automatically.

■ SETTING UP BY GROUP SEARCH










This group search method checks all its preprogrammed codes to find the code that will operate your equipment. This method may takes a few minutes.

1. Turn on your TV.
2. Press & hold the **EZ**  key, and then press & hold the **POWER**  key for 2 seconds.
3. Release from the **EZ**  and **POWER**  key, the red LED light on to indicate the GROUP search mode is enabled.
4. Enter the command code of    and release the key. The **BC-101E** is now enters to **GROUP 1** (Brand A - I) search mode.
 - Command code of    is for **GROUP 2** (Brand J - R) search mode.
 - Command code of    is for **GROUP 3** (Brand S - Z) search mode.
5. Aim the **BC-101E** at your TV until the TV turns off.
6. If the TV turns off, this indicates that the **BC-101E** now set to your TV. Press any key to lock up the code and return to the normal mode.
7. To check the code, press the **CH+/-** , **VOL+/-**  for operation. If no function, repeat Step 2 for next search.
8. Your **BC-101E** is now programmed to operate your TV.
9. In other case, if no code entering within 30 seconds, the red LED light will go out automatically.

■ SECURITY LOCK FOR PROTECTION

This function is to enable the **BC-101E** to perform the security for the remote control and the equipment of use.

To LOCK :

1. Press & hold the  key, and then press & hold the **POWER**  key for 2 seconds.
2. Release from the  and **POWER**  key, the red LED light on to indicate the **SECURITY LOCK** is enabled.
3. Enter the command code of      . The **BC-101E** is now locked.



To UNLOCK :

1. Press & hold the key, and then press & hold the **POWER** key for 2 seconds.
2. Release from the and **POWER** key, the red LED light on to indicate the **SECURITY LOCK** is enabled.
3. Enter the command code of . The **BC-101E** is now unlocked for normal use of operation.

■ PREPROGRAMMED CODE DISPLAY

This method displays its 5-digit preprogrammed codes that will operate your equipment. You can control the display of each position in an easy way. For example, press key [1] for 1st digit of code, press key [2] for 2nd digit of code and press key [3] for 3rd digit of code

1. Press & hold the key and then press & hold the **POWER** key for 2 seconds.
2. Release from the key and the **POWER** key, the red LED light on.
3. Enter the command code of , the red LED light on.
4. For 1st digit code, press digit [1] & release, the red LED will flash in accord to the count of digit code.
5. For 2nd digit code, press digit [2] & release, the red LED will flash in accord to the count of digit code.
6. For 3rd digit code, press digit [3] & release, the red LED will flash in accord to the count of digit code.
7. For 4th digit code, press digit [4] & release, the red LED will flash in accord to the count of digit code.
8. For 5th digit code, press the & release, the red LED will flash in accord to the count of digit code.
9. You must follow the Steps 3-7 in one time, otherwise it will leave automatically.
10. If no key entering within 10 seconds, this feature will stop automatically

■ TECHNICAL SPECIFICATIONS

Communication Mode :	Infrared
Power Requirement :	3V (2 x AAA, IEC-LR3, UM-4 size alkaline batteries)
Effective Range :	10M, ±30 degrees
Max. Operating Temperature :	0°C to +50°C
Max. Storage Temperature :	-25°C to +125°C
Dimension :	55(W) x 26(H) x 130(L) mm
Weight (without batteries) :	45 g.



Congratulazioni! Avete appena acquistato un telecomando universale (TU) capace di pilotare il vostro televisore. Il **BC-101E** è munito di codici preprogrammati che comanderanno la maggior parte delle marche di apparecchi audiovisivi comandati da infrarosso. Introducete semplicemente i codici precisi dei vostri apparecchi ed il **BC-101E** è pronto a funzionare.

■ PREPARAZIONE





1. Togliere il coperchio dell'alloggiamento delle pile, sul retro del **BC-101E** mettervi 2 pile **alkaline** tipo AAA.
2. Rimettere il coperchio.





NOTA : Se le pile vengono tolte per più di due minuti, dovrete riprogrammare i codici del telecomando.

Importante : non mischiare pile usate e pile nuove.

■ PROGRAMMAZIONE











Cercare il tipo di apparecchio nell'elenco dei codici in base alla marca.

1. Accendere l'apparecchio.
2. Tenendo premuto il pulsante **EZ** , premere e tenere premuto il pulsante **POWER**  per 2 secondi.
3. Rilasciare i pulsanti **EZ**  e **POWER**  : il led di trasmissione rimane acceso a segnalare che la modalità di Programmazione è attivata.
4. Immettere il codice a 5 cifre come riportato nell'elenco dei codici.
5. Il led di trasmissione si spegne se il codice immesso è valido. Se il codice non è valido, il led di trasmissione lampeggia due volte e poi rimane acceso. Controllare l'elenco dei codici, tentare con un altro codice, quindi tornare al punto 4.

NOTA : Per uscire dalla modalità Programmazione, premere qualsiasi pulsante, tranne **CH+/-**   e **VOL+/-**  . (Se non viene premuto alcun pulsante per più di 10 secondi, il **BC-101E** torna alla modalità Normale).


■ RICERCA RAPIDA (MANUALE)

Se il telecomando ancora non funziona anche dopo aver provato tutti i numeri di codice previsti per la marca del proprio apparecchio, utilizzare questa funzione per trovare il codice.

1. Accendere l'apparecchio.
2. Tenendo premuto il pulsante **EZ** , premere e tenere premuto il pulsante **POWER**  per 2 secondi.
3. Rilasciare i pulsanti **EZ**  e **POWER**  : il led di trasmissione rimane acceso a segnalare che la modalità di Programmazione è attivata.
4. Immettere il codice di controllo   .
5. Premere e rilasciare nuovamente il pulsante **POWER**  : il led di trasmissione lampeggia velocemente a segnalare che la modalità Ricerca è attiva.
6. Puntare il **BC-101E** in direzione dell'apparecchio. Premere e rilasciare lentamente il pulsante **POWER**  fino a quando l'apparecchio non si spegne.
7. Premere il pulsante  per bloccare il codice e tornare alla modalità Normale.









8. Controllare che l'altro pulsante funzioni. In caso di funzionamento non corretto, ripetere il passaggio 1.

NOTA : Nella modalità Ricerca funzionano tutti i pulsanti tranne **POWER** . È quindi possibile controllare il funzionamento degli altri pulsanti senza uscire dalla modalità Ricerca. (Se non viene premuto alcun pulsante per più di 30 secondi, il **BC-101E** torna alla modalità Normale).

■ RICERCA AUTOMATICA








Utilizzando questa funzione è possibile anche trovare il codice corrispondente alla marca.

1. Accendere l'apparecchio.
2. Tenendo premuto il pulsante **EZ** , premere e tenere premuto il pulsante **VOL +**  o **VOL -**  per 2 secondi.
3. Rilasciare i pulsanti **EZ**  e **VOL +**  o **VOL -** : il led di trasmissione rimane acceso a segnalare che la modalità di Ricerca automatica in avanti (o indietro) è attiva.
4. Puntare il **BC-101E** in direzione del l'apparecchio fino allo spegnimento di quest'ultimo.
5. Premere qualsiasi pulsante per bloccare il codice e tornare alla modalità Normale.
6. Controllare che l'altro pulsante funzioni. In caso di funzionamento non corretto, ripetere il passaggio 1.

NOTA : Se quando la modalità Ricerca automatica è attiva non viene premuto alcun pulsante, il **BC-101E** torna alla modalità Normale, fino a quando ciascun codice dell'apparecchio non venga trasmesso.

■ RICERCA DI GRUPPO

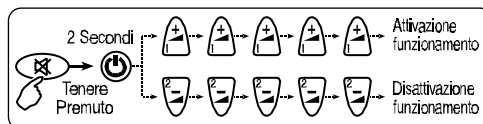
Utilizzando questa funzione è possibile cercare rapidamente il codice dell'apparecchio.

1. Accendere l'apparecchio.
2. Tenendo premuto il pulsante **EZ** , premere e tenere premuto il pulsante **POWER**  per 2 secondi.
3. Rilasciare i pulsanti **EZ**  e **POWER** : il led di trasmissione rimane acceso a segnalare che la modalità di Programmazione è attivata.
4. Immettere il codice di controllo ; quando il pulsante viene rilasciato, il **BC-101E** entra in modalità di ricerca **Gruppo 1**. (Con il codice di controllo  il **BC-101E** entra in modalità di ricerca **Gruppo 2**, con il codice di controllo  il **BC-101E** entra in modalità di ricerca **Gruppo 3**).
5. Puntare il **BC-101E** in direzione del l'apparecchio fino allo spegnimento di quest'ultimo.
6. Premere qualsiasi pulsante per bloccare il codice e tornare alla modalità Normale.
7. Controllare che l'altro pulsante funzioni. In caso di funzionamento non corretto, ripetere il passaggio 1.

NOTA : Se quando la modalità Ricerca gruppo è attiva non viene premuto alcun pulsante, il **BC-101E** torna alla modalità Normale, fino a quando ciascun codice del Gruppo non venga trasmesso.











■ ATTIVAZIONE / DISATTIVAZIONE DELLA FUNZIONE BLOCCO DI SICUREZZA



■ VISUALIZZAZIONE DEL CODICE DELLA MARCA

Ciascun codice di marca è composto di 5 cifre. È possibile visualizzare il numero di codice utilizzando la modalità Visualizzazione.

1. Tenendo premuto il pulsante , premere e tenere premuto il pulsante **POWER**  per 2 secondi.
2. Rilasciare i pulsanti  e **POWER** : il led di trasmissione rimane acceso a segnalare che la modalità di Programmazione è attivata.
3. Immettere il codice di controllo   : il led di trasmissione rimane acceso a segnalare che la modalità Visualizzazione è attiva.
4. Premere e rilasciare il pulsante [1]: il led lampeggia. Il numero di lampeggi del led corrisponde al primo numero del codice.
5. Premere e rilasciare il pulsante [2]: il led lampeggia. Il numero di lampeggi del led corrisponde al secondo numero del codice.
6. Premere e rilasciare il pulsante [3]: il led lampeggia. Il numero di lampeggi del led corrisponde al terzo numero del codice.
7. Premere e rilasciare il pulsante [4]: il led lampeggia. Il numero di lampeggi del led corrisponde al quarto numero del codice.
8. Premere e rilasciare il pulsante : il led lampeggia. Il numero di lampeggi del led corrisponde al quinto numero del codice. Il led rimane acceso per 1 secondo circa, poi si spegne e torna in modalità Normale.

NOTA : Se non viene premuto alcun pulsante per più di 10 secondi, il **BC-101E** torna alla modalità Normale.

■ CARATTERISTICHE TECNICHE

Modo di comunicazione :	infrarosso
Alimentazione :	2 pile alcaline del tipo AAA, IEC-LR-3, UM-4, 3V
Portata :	10m, ±30°
Temperatura di servizio max :	da 0°C a 50°C
Temperatura di conservazione max :	-25°C a +125°C
Dimensioni :	55(W) x 26(H) x 130(L)mm
Peso (senza pile) :	45g

Brand/Device	Gp	TV	Brand/Device	Gp	TV
Admiral	1	11224,11312,13424,14143 14144,14431,14442	Clarivox	1	11112,11114,11414,12312 12421,12422,14212,14442 21122,21141
Agashi	1	11414	Cofadel	1	11332,11444,14133,14224 14313,14412,21122
Aiwa	1	13411,21313	Condor	1	>> White - Westinghouse
Akai	1	11111,11113,11134,11142 11144,11224,11344,11414 11424,12242,12322,12423 13432,13441,14211,14332	Contec	1	11113,11224,12312,14113 11224
AKI	1	11113	Cosmel	1	11224
Akura	1	11144,12344	Crosley	1	11133,11221,12243,12312 12331,13424,13442,14142 14234,14432,14442
Alba	1	11242	Crown	1	11224,11242,11414,12424 12431,14142,14211
Albiral	1	11114,11144,11221,11414 12212,12243,12344,14212 14424	Crystal	1	13423
Alhori	1	11113	Cs. Electr.	1	11242,14211
Allorgan	1	11113	CTC Clatronic	1	11221,11242,12212,12243 12344,12424,12431,14142 14211
Amplivision	1	11113,11114	Cymatic	1	11113,11144,14212
Amstrad	1	11111,11224,12344,13422 14143	Daewoo	1	11124,11221,11224,12423 13313,14211,14241,21222 21321
Anitech	1	11224,11414,14142	Dansai	1	11113,12344,14114
ARC EN	1	>> Thomson	DAWA	1	11414
CIEL (F)	1		Decca (UK)	1	11112,11113,11214,11223 11414,13412
A.R.SYSTEM	1	11114	Denver	1	11224,11414,13333
ARC-TECH	1	13333	Desmet	1	11144,11234,11414
ART-TECH	1	11414	Distar	1	12412
Aristona	1	>> Philips	Domoh	1	11414
Arthur Martin	1	>> Salora	Doric	1	12134,13424,14433
ASA	1	11111,11121,11122,11123 11132,11232,11414,12312 12343,13424,14213,14214 14431,14442,14444,21114 21121	Dual	1	11113,11131,11134,11144 11224,11414,13141,13412 13424,14114,14143,14434
Asberg	1	11414,12424,14142	Dual-Tec	1	11111,11113,11131,11144 11221,11224,11414,13422 14424
Astra	1	11224	DUJA	1	12344,21144,21224
Astro Sound	1	11114,11144,11414	Dumont	1	11132,11221,11232,11414 12212,12312,12424,14142 14213,14214,14442,21121
Asuka	1	11144,14211	Edan Line	1	11414
Atlantic	1	>> White - Westinghouse	Elbe	1	11112,11113,11114,11134 11144,11224,11441,12312 13114,14143,14144,14212 14242,14424
Atoro	1	11224	Elcit	1	>> Magnadyne
Audiosonic	1	11224,11242,11414,12344	Electro	1	11111
Audioton	1	11113,11224	Elector Tech	1	11224
Aurora	1	11113,12423	Elektronska	1	14212
Ausind	1	11122,21122	Elin	1	11113,11132,11224,11414 11424,13432
Autovox	1	11113,11121,11133,11134 11223,11412,11413,12121 12243,12244,13424,14221 14222,14223,14434,21114 21134	Elite	1	11431,14111
AWA	1	11224,11414,12344,12423 13341	Elman	1	11144,11221,13422,14424
Baird	1	11223,12411,21132	Emerson	1	11144,11221,11234,11414 12212,12243,12312,12344 13333,14142,14213,14243 14442
Bang & Olufsen	1	11414,12312,12433,14442 21143	Engel	1	11144
Barco	1	12312,14224,14231	Eurocom	1	11144
Barcom	1	12412	Euroman	1	11113,11414
Basic Line	1	12412,13424,14232	Europhon	1	11112,11113,11144,11221 11222,12124,12212,12243 14212,14424
Baur	1	11124,11134,11224,11414 11424,12221,13423,13424 13441,13444,14431,14433 21123,21144	Expert	1	12141
Bazin	1	11113,13432	Fagor	1	11144
BEKO	1	12431,13324	Fenner	1	11224,11414,12423
Bifonic	1	11113	Ferguson	1	>> Thom - Ferguson
Bigston	1	11224,12344	Fidelis	1	11113,11224,11414,14114
Blaupunkt	1	11124,11141,11142,12331 12332,12333,13231,13441 13444,14111,14233,21233	Fidelity (UK)	1	11113,11144,11231,11322 11323,12322,13424,14114 21124
Blausonic	1	11113	Filmnet	1	11414,13123,13212
Blue Star	1	11144	Filsai	1	11113
Bosh	1	14111	Finlandia	1	13432
Brandt	1	11332,11444,14133,14224 14313,14412,21122	Finlux	1	11111,11121,11122,11123 11132,11221,11232,11414 11424,12212,12244,12343 14244,13424,13432,14214 14432,14444,21114,21121 21122
Brion Vega	1	11134,11414,12121,12312 12413,12414,13114,13121 13122,13414,14143,14442	First Line	1	11113,11144,11221,11224 11414,13424
Bruns	1	11134,11221,11344,11424 12212,12312,12324,14424 14442,21141	Fisher	1	11113,11132,11233,11311 11344,12312,12422,12431 13141,13322,13424,14213 14243,14244,14432,14434 14442,21141,21214
BSR	1	11143,11144,11211,11424 13422,13432,14113	Formenti-Phoenix	1	11113,11122,11144,11234 11241,11414,12312,12344 13422,13424,14111,14142 14424,14432
Bush (UK)	1	>> RBM (UK)	Fortess	1	11114,13422
Cabletime	1	12342,13211,13214			
Casio	1	11414,13423			
Century	1	11221,12243,12312,14442			
CGE	1	11133,11144,11213,11221 11224,11414,12243,12331 12424,12431,13432,13442 14142,14144,14234,14424 14434			
CGM	1	11224,12344,14211			
Chaparral	1	13331			
CIE	1	12423,14211			

Brand/Device	Gp	TV	Brand/Device	Gp	TV
France Telecom	1	13124,21234	Interfunk	1	11111,11134,11213,11312
Frontech	1	11224			11313,11341,11342,11344
Fujitsu	1	11424,14211,14221			11414,11424,12312,12424
Fumeo	1	11424			13423,13424,13433,14133
Funai	1	11143,11224,12344,14113			14213,14231,14233,14432
		21243			14441,14442,21231
Galaxy	1	12424,12431,14142	Intervision	1	11113,11124,11144,11221
Galeria	1	11224			11344,11414,12212,12243
GBC	1	11112,11113,11144,11221			12244,14424
		11223,11224,11242,11243	Irradio	1	11113,11122,11144,11224
		11244,11311,11414,12312			11242,11323,11414,12243
		12423,13424,14211,14424			12244,12432,13413,13414
		14432			14114,14211,14332,21122
Geber	1	13424			21211
GEC (UK)	1	11113,11223,11244,11414	Iskra	1	11144,12212,14212
		12312,13424,13432,14431	ITC	1	11144
		14432,14433	ITT-NOKIA	1	11111,11134,11144,11213
Geloso	1	11111,11113,11144,11221			11243,11312,11341,11343
		11224,11242,11414,12243			11414,11424,12411,12423
		12423,13424,14134,14211			13424,13432,14212,14232
		14212,14424,14431,14432			14332,14431,14432,14433
Genexxa	1	11242			14441,21123,21222
Gitem	1	13424	Janco	2	13213
GM	1	11224,12344	Jerrold	2	13342
GMG	1	12424	Jet Point	2	13423,14334
Goldstar	1	11113,11124,11131,11144	Johnson	2	11113
		11224,11244,11414,11424	JVC	2	11344,11411,12312,12433
		11443,12243,12244,13133			13143,14434,21124,21232
		13323,13333,13424,13444	Kaiser	2	11414
		14114,14121,14424,14431	Kaisui	2	11113,11224,12412,12424
		21144,21211,21222,21244			14211
Goodmans	1	11224,11414,12423	Kamosonic	2	11113
Gorenje	1	12431,12432,14243	Karcher	2	11113,11114,11232,11244
GPM	1	11224,14211			11414,12124,12412,13333
Graetz	1	>> ITT-NOKIA	Kapsch	2	13424,14431,21144
Granada (UK)	1	11112,11113,11243,11311	Kendo	2	>> ITT-NOKIA
		11312,11313,11314,11414			11113,11134,11211,11244
		11434,12131,12132,12144			12212,12243,13114,13424
		12134,12242,12312,12441	Kennedy	2	11131,11134,11412,11413
		13423,13424,13431,13432			11424,13114,13424,14143
		13433,13434,14231,14314			14144,14221,14223,14432
		14431,14433,14441,21122			21134
		21144,21231	Klarmax	2	11113,11114,11144,14212
Gronic	1	11113,11144,11414			14231
Grundic	1	11321	Kneissel	2	11441,14144
Grundig	1	11122,11124,11142,11312	Knerting	2	11234,11414,12312
		11321,11414,13441,13444	Koenig	2	11234,13424
		14222,14321	Kolster	2	11113,11114,11221,11414
Grandin	1	11144,11234,13424,14131			12212,12244
		21122	Korting	2	11234,12312,12314,12431
G. Technics	1	11224			12432,14243,14442
GTT	1	12424	Kortron	2	12344
Hampton	1	11113	Kriesler	2	>> Philips
Hanseatic	1	11113,11234,11311,11314	Kronne	2	11113
		11414,11424,12312,13412	Kyoto	2	11113,11144
		13423,13424,13433,13444	Lenco	2	11244,11242,11424,12212
		14322,14431,14432,21144			12423,13223,13224,14113
Hantarex	1	11112,11414,14212	Lenoir	2	11113,11224,11414,13333
Hennermann	1	11213,13424,14434			13424
HIFI VOX (F)	1	>> Thomson	Leyco	2	11223,11414,12344,13422
Higashi	1	11113	LG	2	21314
Hinari	1	11111,11214,11224,11311	Liesenkott.	2	13423,14111
		11322,11323,14114,14434	Loewe Opta	2	11112,11132,11414,12312
Hitachi	1	11111,11113,11243,11244			12313,13423,14112,14213
		11311,11314,11324,11331	Logik	2	11214,12231,12322,21124
		11332,11333,11334,11421	Luma	2	11111,11134,11421,11424
		11423,11424,12312,12334			13424,14143,14221,14431
		13424,13432,13443,14114			21134
		14121,14133,14311,14323	Luxor	2	11111,11113,11134,11312
		14324,14431,14432,14433			11314,11334,11421,11422
		21111,21133,21144			11423,11424,11443,12343
Hoshai	1	14211			12411,13424,13432,14121
Hyper	1	11113,11144,11224,11242	Magnadyne	2	11112,11144,11213,11221
		11414,12243,12244,13224			11224,11414,12212,12243
		13432,14211,14312,14332			12312,12424,13423,13424
		14424			14134,14212,14424,14432
Hypson	1	11414			14434,14442
Ibervisao	1	11144,13424	Magnafon	2	11112,11113,11122,11221
ICE	1	11242,14211			11222,11414,12124,12212
IEG	1	11113			13424,14212,21122
Imperial	1	11133,11144,11213,11221	Manesth	2	11234,13424,14322
		11414,12243,12331,12344	Marantz	2	11414,13433
		12424,12431,13432,13442	Marech	2	11234
		14142,14144,14234,14424	Mascot	2	11221
		14434	Matsui	2	11113,11144,11214,11224
Indesit	1	14333			11243,11431,12242,13422
Ingelen	1	>> ITT-NOKIA			13424,14322,14431,14433
Inno Hit	1	11112,11113,11221,11223			14434,21144
		11224,11323,11414,11443	Maxcot	2	12243
		12243,12412,13333,13424	Maximal	2	11111,14434
		13432,14211,14212,21211			

Brand/Device	Gp	TV	Brand/Device	Gp	TV
Maxell	2	11224	P. Cinema	2	11114,14212
Maxwell	2	11414,12212,14212	PCM	2	11414
Meletronic	2	11124,11224,11232,11414 12243,12343,13141,14214 14434,14444,21121	Pershin	2	21122
M. electr.	2	11132,11221,11224,11232 11414,12244,12423,13424 14214	Philharmonic	2	11113
Metz	2	11142,11432,11433,12312 12434,13441,13444,14213 14341,14342,14442	Philco	2	11133,11144,11213,11221 11224,11414,12243,12312 12331,12424,12431,13424 13432,13442,14142,14144 14213,14234,14424,14432 14434,14442
Micron	2	11113	Philex	2	12322
Minerva	2	11124,11142,11312,13441 13444,21122	Philips	2	11113,11313,11342,11414 12312,12323,12341,13124 13423,13433,13444,14123 14133,14214,14231,14421 14442,14443,21231,21234
Mitsubishi	2	11124,11214,11224,11311 11414,11431,11434,12241 12311,12312,12441,12442 13423,13441,14213,14442 21221	Phoenix	2	>> Formenti - Phoenix
Mivar	2	11112,11113,11441,11442 11443,13144,14212,14343 14344,21131	Phonola	2	>> Philips
MTC	2	11144	Pioneer	2	11112,11333,11414,11424 12213,13222,13423,13433 14133,14443,21111,21241
Multisystem	2	11414	Plantron	2	11224
Multitech	2	11113,11124,11144,11221 11224,11242,11311,12212 12243,12244,12312,12431 14142,14211,14243,14424	P. marconi	2	11332,11444,14133,14224 14313,14412,21122
Murphy (UK)	2	>> RBM (UK)	Polestar	2	13321
Nagoya	2	13432	Prandoni-	2	11111,11112,11122,11221 11241,12243,13424,14212 14431
Naonis	2	>> Seleo	Prince	2	14431
NEC	2	11241,11224,12312,12443	Praxis	2	13332
Neckermann	2	11111,11113,11234,11311 11314,11414,11421,12221 12431,13424,13432,13444 14111,14213,14233,14431 14442,21144,21213,21233	Prima	2	11224
N.E.I.	2	11414,12421	Profex	2	11224,11424,14111,14142 14424
Newmar	2	11144	Proline	2	13111
Newtech	2	11113,11414	Prosat	2	11114
Nikkai	2	11113,11242,14121	PYE	2	13423,14231
Noblex	2	11224,12312,12423,13322 14244	PYE (UK)	2	>> Philips
Nobilko	2	11113,11122,11221,11312 11414,12212,12243,14142 14411,21121,21122	Quasar	2	>> Sambers
Nogamatic (F)	2	>> Thomson	Quelle	2	11111,11113,11114,11121 11122,11123,11124,11132 11134,11214,11224,11232 11243,11312,11341,11414 11424,11443,12221,12244 12312,12331,12333,12344 13423,13424,13432,13433 13434,13441,13444,14111 14113,14114,14214,14233 14234,14244,14314,14444 21114,21121,21122,21211 21233
Nordring	2	11133	Radiola	2	>> Philips
Nordmende	2	11332,11333,11344,11411 11414,11444,12111,12112 12113,12114,12121,12334 12444,13424,13432,14133 14224,14412,21111,21132 21142	Radiomarelli	2	>> Magnadyne
Nordway	2	11144	Radionette	2	>> Magnadyne
Oceanic (F)	2	11111,11134,11421,12122 12123,13424,14432	Rank /	2	11122,11144,11212,11441 12134,13424,14431,14433 14434,21144,21212
Oceanic (ITT)	2	11111,11424,12411,13424 13432,14131,14232	RBM (UK)	2	11122,11144,11212,21311 11414
Octal	2	11113	RCA	2	13234,13311,13312,21311
Okano	2	12431	Recor	2	11414
Onceas	2	11113,11221,11224	Redifusion	2	11111,11134,11243,11424 12134,13424,14433
Onwa	2	>> Kausui	REX	2	>> Seleo
ORAVA/OTF	2	11224	RIZ	2	11144
ORIGO(SAT)	2	11114	Roadstar	2	11224,11242,14211
Orion	2	11111,11143,11213,11214 11224,11414,11431,12124 12344,13111,13112,13422 13423,13424,14113,14114 14322,14413,14414,14434 14212	Robotron	2	>> Bruns
ORSOWE	2	14212	Robotron E.	2	11344,12312
Osaki	2	11414,12344,14113	Rowsonic	2	11113
Otto Versand	2	11113,11124,11311,11314 11414,11424,12132,12221 12244,12312,13423,13424 13433,13441,13444,14113 14322,14431,14432,21144	RTF	2	>> Bruns
Pael	2	11113,11122,21122	SABA	3	11112,11332,11333,11344 11444,12111,12112,12114 12142,12312,12334,12444 13424,14133,14141,14212 14214,14412,14431,21111 21132,21142,21213
Palladium	2	12431,13114	Saisho	3	11113,11144,11214,11431 13221,13422,13424,14211 14322
Panama	2	11414	Salora	3	11111,11134,11221,11314 11334,11341,11421,11423 11424,12411,13131,13213 13424,13431,13432,14121 14431,14433,14441,21133 21144
Panavox	2	13424	Samberg	3	11114,11443,12212,14142 14212,21121,21122
Panasonic	2	11113,11114,11144,11234 12122,12131,12132,12133 12344,13113,13231,13424 13444,14122,14432,21224	Sambers	3	11112,11113,11122,11221 11222,11414,11443,12124 21211
National	2	12344	Samsung	3	11113,11223,11224,11323 11414,11443,12344,12431 13314,13322,13333,13422 14114,14334,14411,21211 21322
Panoramic	2	14133	Sandra Col.	3	11113,14212
PATHE	2	11113,11114,11144,11234			
CINEMA (F)	2	12122,12431,14424			
PATHE	2	>> Thomson			
MARCONI (F)	2				
Pausa	2	11224			

Brand/Device	Gp	TV	Brand/Device	Gp	TV
Sanyo	3	11113,11132,11214,11223 11224,11232,11311,11343 11344,12143,12144,12312 12411,12422,12431,13241 13424,14124,14214,14243 14244,14314,14442,14444 21123,21141,21214	Teleavia	3	>> Thomson
Schaub Lorenz	3	>> ITT - NOKIA	Telefunken	3	11333,11344,11411,11444 12223,12224,12231,12232 12331,12333,12444,14133 14234,14313,14331,14333 14412,14422,21111,21112 21132,21142
Schneider	3	11113,11131,11134,11144 11224,11233,11241,11242 11414,12243,12244,12312 13141,13412,13423,13424 13444,14133,14143,14211 14214,14222,14231,14421 14424,14432,14434,21114	Teleopta	3	11224
Schneider (F)	3	>> Philips	Teleservice	3	13132
Scott	3	11234,11414	Televideon	3	>> Formenti - Phoenix
SEG	3	11113,11144,11221,12212 14142,21141	Tensai	3	11113,11132,11144,11221 11224,11232,11234,11344 11414,12212,12423,13423 14113,14114,14211,14214 14423,14444
Seleco	3	11131,11134,11144,11414 11424,11444,12141,12312 13114,13424,13432,14143 14144,14221,14223,14412 14431,14434,21134	Tesla	3	11144
Sharp	3	11311,12211,12312,12423 13233,21124	Thomson	3	11332,11333,11344,11444 12112,12114,12334,14133 14224,14412,21111,21122 21132,21142,21213
Shorai	3	14113	Thomson (F)	3	>> Thomson
Shivaki	3	13423	Thorn-Ferguson	3	11113,11114,11144,11322 11344,11424,11444,12221 12231,12232,12233,12234 12241,12344,12444,13142 13423,13424,13441,13444 14132,14133,21122,21124 21132
Siarem	3	11112,11221,12212,12312 13424,14212,14214,14432 14442	Tobo	3	11224
Sicatel	3	11114,11144	Tomita	3	11113
Sidac	3	11144	Topvision	3	11144
Siemens	3	11124,11142,11323,12331 12332,12333,13441,13444 14111,14114,14233,14244 14314,21214,21233	Toshiba	3	11122,11212,11311,11441 12242,12312,13423,21113 21212,21242
Siera	3	>> Philips	Trans Continens	3	>> Prandoni - Prince
Siesta	3	13134	Transcontin	3	13424,14212
Silma	3	11414	Tristar	3	12322,21124
Silva	3	11224	Trevi	3	11224,14211
Silver	3	12344,14211	Triumph	3	13422,21121
Singer	3	11221,11224,11414,12212 12243,12312,13424,14131 14144,14212,14214,14432 14442	Uher	3	11131,11133,11233,11234 11241,12124,13114,14222
Sinudyne	3	11143,11213,11221,11242 11414,11431,12124,12212 12312,13111,13114,13422 13423,13424,14113,14143 14211,14322,14413,14414 14432,14434,14442	Ultravox	3	11113,11114,11221,11414 11421,12212,12243,12312 13424,14214,14431,14432 14442
Slava	3	11113	Unic Radio	3	11113,11424,14212,14243
S. Lorenz	3	11111,11224,11424,12423 14211	Universum	3	11113,11114,11122,11132 11214,11224,11232,11414 11424,11443,12221,12244 12312,12344,13423,13424 13432,13441,13444,14111 14113,14114,14214,14233 14234,14244,14314,21114 21121,21122
Solavox	3	11424,13424,13432,14121	Univox	3	11114
Sonitron	3	11113	Uranya	3	11224,11234,11414,12212 14212
Sonoko	3	11113,11224,11414,13333 14211	Utax	3	11113,11224
Sonolor	3	>> ITT - Oceanic	Vanguard	3	11113,11224,13424
Sorotec	3	11224,11414,12244,12431	Veco	3	11224
Sony	3	11213,11214,11242,11311 12213,12214,12221,12312 12321,21223	Vegavox	3	12424
Starlite	3	11224	Vestel	3	11144,11414
Standard	3	11113,11221,11224,11234 12243,14211	Vexa	3	11224,11414,14211
Starlux	3	11224	Videologic	3	14211
Stern	3	>> Seleco	Videoton	3	11113,12424,13424,13432
STVI	3	11113,11144	VIDION	3	11224
Sunkai	3	14113,14322,14414	VISA	3	13432
Superla	3	11144,14212	Visiorex	3	14212
SuperTech.	3	11224,11242,11414,13333 13421	Vistar	3	14232
Supra	3	11224,12423	Voxson	3	11111,12312,13424,14431 14442,21122
SYC Line	3	11224	Walkie	3	14222
Tadistar	3	12424	Waltham	3	>> Videoton
Tai Wah.	3	13333,13334	Watson	3	11234,11414,12331,12344 13422,13424,14111,14211
Talent	3	13441	Watt Radio	3	11113,11114,11213,11221 11222,12124,12214,13424 14432,14434
Tandberg.	3	11112,11121,11134,11332 11344,11433,12313,12434 13124,14113,14133,14143 14341,14442,21234	Wega Color	3	11311,12312
Tandy	3	11242,13424,13432,14131	Wegavox	3	11144,11224,12424,14434
Tashiko	3	11113,11244,13424,14314	Weltblick	3	11234,11414
Tatung	3	11112,11113,11214,11223 11414,12222,14113	Weston	3	11144,14424
Tec	3	>> Dual - Tec	White-Westinghouse	3	>> Formenti - Phoenix
Tech	3	11111	Winstone	3	11224
Technica	3	14211	Wintrenitz	3	11224,12423,13224,14312
Technics	3	12131,12132	Word tech	3	11414,13333
Teinel	3	11144,11414	Yoko	3	11113,11414,11224,12344
Teknant	3	11224,11414	York	3	14211
Tele +1	3	13212	ZAMPA	3	13424
			Zanussi	3	>> Seleco
			Zenith	3	13132,13232,21312
			Zoppas	3	>> Seleco
			Other	3	13242,13243,13244,13343 13344