

SL
Power Amplifiers

- SL 900
- SL 1200
- SL 1800
- SL 2400



Solid DYNACORD technology for universal application at highly competitive prices was the maxims for the development of the SL series of power amplifiers.

They offer high, stable power output and a high efficiency factor on the high performance level and are therefore the ideal choice for driving a multitude of mobile and club systems, such as e.g. loudspeakers of the D-Lite, VariLine or Forum Line families.

SL series power amplifiers are equipped with protection against overheating, overload, short-circuits, high frequencies and DC at the output.

Damage to the end transistors through the feedback of electrical energy is prevented by the back EMF protective circuitry.

When powering up, a relay delays the switching on of the power outputs. In addition, a power-up current limiter prevents the blowing of the mains fuses.

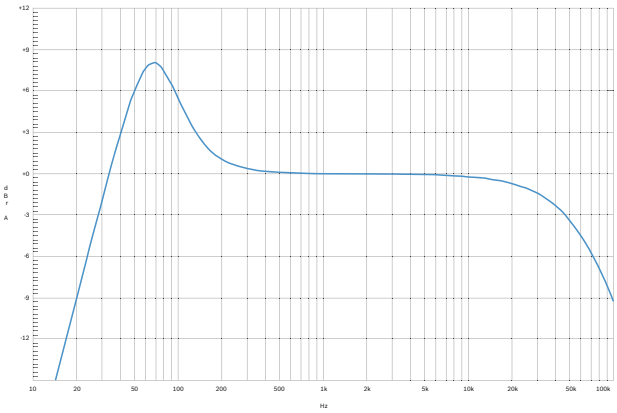
Fast audio processors continuously compare the input and output signals. In the event of any non-linearity, the processors send control signals to the limiters, which dynamically reduce the input gain of the power amplifier.

SL Series

SOLID ALL-ROUNDERS AT A COMPETITIVE PRICE



The level controls on the front are calibrated in dB and recessed into the front panel to guard against mechanical damage. The easy-to-read LED display with its Power, Protect, Signal and Limit indicators offers a quick overview of the operating state of the power amplifiers.



LPN-FILTER

The switchable Low-Pass Notch (LPN) filter is a typical DYNACORD special feature. This filter circuitry corrects the frequency response and optimizes the transient behaviour of loudspeakers. The resulting dynamization cannot be achieved with any graphic or parametric equalizer or 'bass booster', since the way the LPN operates is based to an important extent upon a dynamic optimization of the slew rate of the signal. The switch allows you to compare the acoustic difference with and without the LPN. The whole signal becomes much more powerful and voluminous. The effect is particularly noticeable with small to medium-sized full-range loudspeakers but also with applications featuring subwoofers.

The electronically balanced XLR IN / OUT sockets are provided for direct operation with professional mixing consoles and signal processors. All the models in the SL series are designed for a Constant Gain of 32 dB. The power outputs for Channels A and B as well as the Bridged Out are on Speakon connectors. The signal of Output B is additionally available on pins ±2 of Output A, so that with 4-pin wiring a two-way system can be driven. A Ground Lift switch is also provided to separate the chassis ground from the signal ground in order to eliminate ground loop hum.

German engineering. Manufactured in accordance with the Bosch Production System (BPS) in Zhuhai, China

Recommended Products / Application

	Mobile Audio			Fixed Installation					
									
	Live Music	**Concert Sound**	**Touring**	**Multi Media**	**Club/Disco**	**ProSound**	**Network**	**Commercial**	**Life Safety**
	Club-Gigs Dance Bands Mobile DJ	Corporate Rental Top 40 Events	Large Live Productions Small - Medium Festival	Boardrooms Conferencing Hotels	Clubs Lounges Discotheques Poolbars Casinos	Theaters Concert Halls HOW Stadiums Cruise LIners Multifunctional Halls	Conference Centers Hotels Business Buildings Arenas Expo-Halls	Shops Malls Bistros BGM	Voice-EVAC Industry Railway Offshore
PowerH Series		●	●		●	●	●		
LX Series	●	●	●			◒			
CL Series	●	◒			◒			◒	
SL Series	●	○						○	
DSA Series *Multi Channel* / *Dual Channel*				●	●	●	◒	●	
PCL Series								●	
DPA Series *4000 Series* / *8000 Series*				○		◒	●	○	●

● Perfect Solution ◒ Excellent Choice ○ Suitable

In our multimedia world, professional audio systems are playing an ever more important role. For this, power amplifiers are needed the characteristics and properties of which are tailored precisely to the application in question.

The spectrum of these requirements—from live music to fixed installation—has an extremely wide bandwidth and extends from very high power output combined with minimum weight to remote supervision and network capability. DYNACORD's extensive power amplifier portfolio offers an ideal and cost-effective solution for every field of application.

SL Series

TECHNICAL SPECIFICATIONS

General	SL 900			SL 1200		
Load Impedance	2 Ω	4 Ω	8 Ω	2 Ω	4 Ω	8 Ω
Maximum Midband Output Power, 1 kHz, THD=1%, Dual Channel	650 W	450 W	270 W	900 W	600 W	380 W
Rated Output Power, 20 Hz ... 20 kHz, THD <0.1%	-	400 W	200 W	-	500 W	250 W
Max. Single Channel Output Power Dynamic-Headroom, IHF-A	1150 W	660 W	350 W	1700 W	950 W	480 W
Max. Single Channel Output Power Continuous, 1kHz	850 W	540 W	310 W	1200 W	750 W	420 W
Maximum Bridged Output Power 1 kHz, THD=1%	-	1300 W	900 W	-	1800 W	1200 W
Maximum RMS Voltage Swing 1 kHz, THD=1%	55.3 V			65.1 V		
Power Bandwidth, THD=1%, ref. 1kHz, half power @ 4Ω	10 Hz ... 30 kHz					
Voltage Gain ref. 1 kHz	32 dB					
Input Sensitivity at rated output power @ 8Ω, 1 kHz	+2.2 dBu (1.0 V rms)			+3.1 dBu (1.11 V rms)		
THD at rated output power MBW=80kHz, 1 kHz	< 0.03 %					
IMD-SMPTE, 60 Hz, 7 kHz	< 0.1 %					
DIM 30, 3.15 kHz, 15 kHz	< 0.05 %					
Max. Input Level	+21 dBu (8.69 Vrms)					
Crosstalk, ref. 1 kHz at rated output power	< -80 dB					
Frequency Response, ref. 1 kHz	10 Hz ... 40 kHz (± 1dB)					
Input Inpedance, active balanced	20 kΩ					
Damping Factor, 1kHz	> 300					
Slew Rate	25 V/µs			26 V/µs		
Signal to Noise Ratio, A-weighted	106 dB			107 dB		
Output Noise, A-weighted	< -71 dBu					
Output Stage Topology	Class-AB					
Power Requirements	100 V, 120V, 230V, 240V, 50 Hz... 60 Hz (factory configured)					
Power Consumption at 1/8 maximum output power @ 4 Ω	550 W			700 W		
Mains Fuse	240V / 230V: T10AH, 120V / 100V: T20AH			240V / 230V: T12AH, 120V / 100V: T25AH		
Protections	Audio limiters, High temperature, DC, HF, Back-EMF, Peak current limiters, Inrush current limiters,Turn-on delay					
Cooling	Front-to-Rear, 3-stage-fans					
Ambient Temperature Limits	+5°C ... +40°C (40°F ... 105°F)					
Safety Class	I					
Dimensions (WxHxD), mm	483 x 88.1 x 421.5					
Weight	12.6 kg (27.8 lbs)			14.8 kg (32.6 lbs)		

Optional Accesories:
2-Way crossover, internal filter card, 24dB, LR
330Hz (NRS 90249), 500Hz (NRS 90250)
800Hz (NRS 90251), 1200Hz (NRS 90252)

SL 1200



General	SL 1800			SL 2400		
Load Impedance	2 Ω	4 Ω	8 Ω	2 Ω	4 Ω	8 Ω
Maximum Midband Output Power, 1 kHz, THD=1%, Dual Channel	1250 W	900 W	550 W	1800 W	1200 W	750 W
Rated Output Power, 20 Hz ... 20 kHz, THD <0.1%	-	800 W	400 W	-	1100 W	550 W
Max. Single Channel Output Power Dynamic-Headroom, IHF-A	2450 W	1400 W	700 W	3400 W	1800 W	950 W
Max. Single Channel Output Power Continuous, 1kHz	1700 W	1100 W	630 W	2400 W	1500 W	850 W
Maximum Bridged Output Power 1 kHz, THD=1%	-	2800 W	1800 W	-	3600 W	2400 W
Maximum RMS Voltage Swing 1 kHz, THD=1%	78.8 V			90.6 V		
Power Bandwidth, THD=1%, ref. 1kHz, half power @ 4Ω	10 Hz ... 30 kHz					
Voltage Gain ref. 1 kHz	32 dB					
Input Sensitivity at rated output power @ 8Ω, 1 kHz	+5.1 dBu (1.39 Vrms)			+6.6 dBu (1.66 Vrms)		
THD at rated output power MBW=80kHz, 1 kHz	< 0.03 %					
IMD-SMPTE, 60 Hz, 7 kHz	< 0.1 %					
DIM 30, 3.15 kHz, 15 kHz	< 0.05 %					
Max. Input Level	+21 dBu (8.69 Vrms)					
Crosstalk, ref. 1 kHz at rated output power	< -80 dB					
Frequency Response, ref. 1 kHz	10 Hz ... 40 kHz (± 1dB)					
Input Inpedance, active balanced	20 kΩ					
Damping Factor, 1kHz	> 300					
Slew Rate	27 V/µs			30 V/µs		
Signal to Noise Ratio, A-weighted	109 dB			110 dB		
Output Noise, A-weighted	< -71 dBu					
Output Stage Topology	Class-H					
Power Requirements	100 V, 120V, 230V, 240V, 50 Hz... 60 Hz (factory configured)					
Power Consumption at 1/8 maximum output power @ 4 Ω	700 W			850 W		
Mains Fuse	240V / 230V: T15AH, 120V / 100V: T25AH			240V / 230V: T15AH, 120V / 100V: T30AH		
Protections	Audio limiters, High temperature, DC, HF, Back-EMF, Peak current limiters, Inrush current limiters,Turn-on delay					
Cooling	Front-to-Rear, 3-stage-fans					
Ambient Temperature Limits	+5°C ... +40°C (40°F ... 105°F)					
Safety Class	I					
Dimensions (WxHxD), mm	483 x 88.1 x 421.5					
Weight	16.3 kg (35.9 lbs)			17.7 kg (39.0 lbs)		

Optional Accesories:
2-Way crossover, internal filter card, 24dB, LR
330Hz (NRS 90249), 500Hz (NRS 90250)
800Hz (NRS 90251), 1200Hz (NRS 90252)