JBL AMP SERIES
AMP150
AMP350

Intelligent Integrated Amplifier

智能集成功率放大器

用户手册

目录

重要安全说明

ATTENTION: RISQUE DE CHOC ELECTRIQUE - NE PAS OUVRIR

WARNING: TO REDUCE THE RISK OF FIRE OR ELECTRIC SHOCK DO NOT EXPOSE THIS EQUIPMENT TO RAIN OR MOISTURE

以上符号为国际通用电子产品危险警示标识。带箭头闪电的三角形标识用于提示用户注意设备中存在"危险电压"，可导致触电。感叹号三角形符号用来提示用户留意并遵守手册中重要操作与维护（维修）说明。

此类标识用于警示用户本设备内不含用户可自行维修零件。本设备不得擅自开启。请勿擅自对本设备实施任何维修操作。如需维护检修，请咨询相关资质的专业人员。擅自开启设备机箱可导致保修条款失效。本设备严禁淋雨受潮。如有液体渗入，应立即关停设备并送返至代理商处维护。如遇雷暴天气，应断开设备电源，以防设备损坏。

安全须知

使用带电源线设备的用户，请注意此处安全须知！

警告：本设备必须接入具有接地保护的电源插座！

电源线中线缆按以下颜色区分：

黄绿色-地线　　蓝色-零线　　棕色-火线

如设备电源线中线缆颜色标识与所需连接电源插头中接线端颜色标识不一致，请按以下步骤操作：

- 将设备电源线中黄绿色线缆连接至电源插头中标有E、或接地符号、或绿色或黄绿色的接线端；
- 将设备电源线中蓝色线缆连接至电源插头中标有N或黑色的接线端；
- 将设备电源线中棕色线缆连接至电源插头中标有L或红色的接线端。

根据安装现场的供电情况，本设备可能需要使用不同的电源线或连接插头。如需更换连接插头，请咨询相关有资质的专业人员，并参照下表中相关信息。

黄绿线必须与设备机箱相连。

导线		线缆颜色	
		通用标准	其它标准
L	火线	棕色	黑色
N	零线	蓝色	白色
E	地线	绿色/黄色	绿色

警告：如接地保护不良，连接使用的设备或系统可出现故障，并导致设备机箱与大地间产生满载线电压。一旦有人员同时接触机箱与大地，可导致严重伤害甚至死亡。

安全操作警示

妥善保管本安全须知。

留意所有警示信息。

遵守所有操作规范。

严禁在设备周围喷洒液体。请勿在设备上方摆放盛有液体的容器，如花瓶等。

仅使用干布清洁本设备。

严禁堵塞散热口。根据厂商相关说明安装本设备。

严禁在热源附近安装本设备，如散热器、热调节器、热炉或其它制热设备（包括功放）等。

必须使用厂商指定的附件与配件。

雷暴天气或设备长时间停机，请拔下电源插头。

请遵守极性插头或接地插头的安全使用规范。极性插头由两片宽度不一的金属片构成。接地插头则由两极插片与具有安全保护功能的接地插片构成。如所提供的插头与电源插座不兼容，请更换电源插座。有关电源插座的更换事宜，请咨询电气工程师。

注意保护电源线，避免踩踏或碾压。特别注意保护插头端、插座端与设备端线缆。

必须使用厂商指定或随同设备出售的活动机柜、底座、三脚架、支架与作业台。使用活动机柜时，请小心谨慎以防机柜与设备侧翻。如需维护检修，请咨询相关有资质的维修人员。如有以下情形出现，必须对设备进行检修：电缆或插头损坏、液体溅入、异物掉入、淋雨受潮、无法正常运行或设备摔落等。

电源开关：对于设有电源开关的设备，关闭电源开关并未完全断开设备与电源的连接。

电源断路设置：电源插头应保持随时可用。对于采用机柜安装或无法采用插头连接的设备，应在设备机柜或建筑物中配备触点开距不小于3mm的全极电源开关。

对于保险丝接口外置的设备：必须更换同类型同规格的保险丝。

多种输入电压：根据安装现场的供电情况，本设备可能需要使用不同的电源线或连接插头。确保接入电源符合设备后面板所标示的电源类型要求。有关电力方面信息或服务，请咨询相关有资质人员，以免火灾或触电危险。

第一章 产品介绍

1.1 简述

AMP150、AMP350是一台集功放、话筒和处理器于一体的智能集成功率放大器，有150W和350W两种功率可以选择，配合手持无线话筒（AMP-H）、便携无线话筒（AMP-N）和5.25英寸（CV1510）、6.5英寸（CV1610）扬声器，可满足空间大小不同的教室、会议室、多功能厅等场所使用需求。

注：无线话筒和音箱需另行购买。

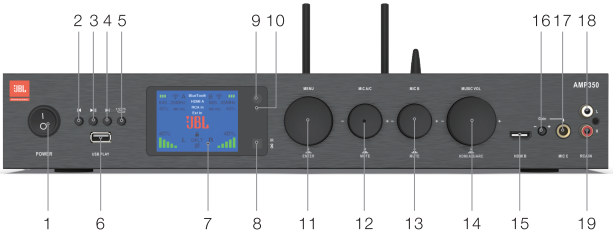
1.2 特点

- 具有话筒自动增益调整功能
- 话筒通道和音乐通道均内置有7段参量均衡
- RCA输入输出电平调整
- 最大音量设置
- 32位DSP音频数字信号处理
- 预置4个场景模式
- 中英文菜单切换
- 自动反馈抑制，多级可调
- 2.8寸彩屏,亮度可调节
- 消防系统联控输入，低电平启动静音
- 支持手持无线话筒、便携无线话筒双无线输入，灵巧联接
- 支持有线话筒输入
- 自动待机，绿色节能
- 红外遥控和锁机，方便又安全
- 话筒高低通、ECHO和REVERB调节
- 支持蓝牙和USB播放
- 蓝牙可根据使用场景重新命名
- 多种安装方式，适应各种应用环境
- 菜单显示可180度翻转，适应多种安装方式
- 多种输入输出接口，设备联接无忧

1.3 装箱清单

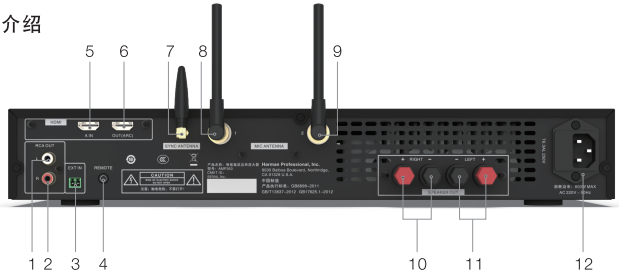
- 智能集成功率放大器 1台
- 中国标准电源线 1条
- 操作说明书 1本
- 遥控器 1个
- 7号电池 2个
- 天线 3支
- 安装套件 1套(侧支架X2+后支架X2)

1.4 面板介绍



1 - 电源开关
2 - (U盘播放)上一曲
3 - (U盘播放)播放/暂停
4 - (U盘播放)下一曲
5 - (U盘播放)单曲循环/列表循环
6 - U盘插孔
7 - 2.8寸彩屏
8 - 红外遥控接收窗
9 - 无线话筒红外对频窗
10- 待机状态指示灯
11- [MENU]/[ENTER] 进入菜单及确认
12 - [MIC A/C]/[MUTE] 话筒A/C音量及静音
13 - [MIC B]/[MUTE] 话筒B音量及静音
14 - [MUSIC VOL]/[HDMI A/B/ARC] 音乐输出音量调整（含USB、蓝牙、HDMI和RCA音量）及HDMI A/B/ARC 输入切换
15 - HDMI B 输入
16 - 话筒C输入电平调整电位器
17 - 话筒C输入插孔（TRS座）
18 - RCA 输入左通道（L）
19 - RCA 输入右通道（R）

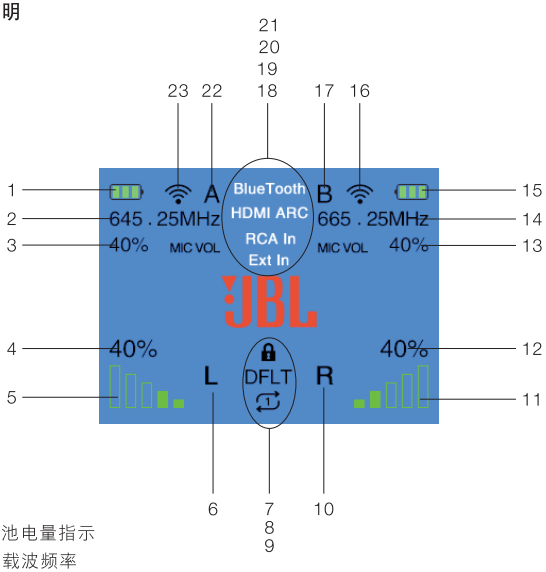
1.5 后面板介绍



1 - RCA输出左通道（L）
2 - RCA输出右通道（R）
3 - 警报信号接口
4 - 红外遥控外接输入口
5 - HDMI A 输入
6 - HDMI 输出(电视回传)
7 - 无线话筒对频天线
8 - 无线话筒B接收天线
9 - 无线话筒A接收天线
10 - 音频输出(右声道,连接音箱R)
11 - 音频输出(左声道,连接音箱L)
12 - 电源插座

注:
1）警报信号接口--检测到低电平时，本机启动静音。
2）红外遥控外接输入口(接口4)的引脚定义如右图。

1.6 显示屏图标说明



1-无线话筒A电池电量指示

2-无线话筒A的载波频率

3-无线话筒A的音量指示

4-音乐总输出音量左通道指示

5-音乐总输出音量左通道图形指示，一格表示总音量的20%

6-音乐总输出左通道

7-面板按键锁指示，面板按键锁定时显示

8-当前预置模式显示，有“DFLT(默认模式)”，“SPCH(演讲)”，“MUSC(影音)”，“PERF(演出)”等四个模式

9-U盘播放当前模式，表示单曲循环，表示列表循环

10-音乐总输出右通道

11-音乐总输出音量右通道图形指示，一格表示总音量的20%

12-音乐总输出音量右通道指示

13-无线话筒B的音量指示

14-无线话筒B的载波频率

15-无线话筒B电池电量指示

16-无线话筒B信号强度指示

17-无线话筒B指示

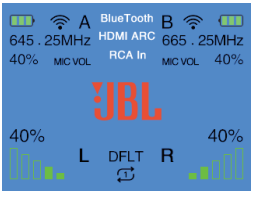
18/19/20/21-当前有信号源输入的接口指示(有Ext In,RCA In,HDMI A或HDMI B或HDMI ARC，Bluetooth或USB共七个输入接口)

22-无线话筒A指示

23-无线话筒A信号强度指示

1.7 菜单图标说明

当本机显示屏显示为待机界面时(见右图)，短按[MENU]旋钮，进入菜单操作界面，这时，旋转[MENU]旋钮，可循环选择不同的菜单项，被选中的菜单项会激活(变大并显示为橙色)，如右图所示。再短按[MENU]旋钮，可进入菜单参数项设置界面。



待机界面

菜单操作界面的图标说明如下：

- **回待机界面**，当此菜单激活时，短按[MENU]旋钮，可返回到待机界面。

- **系统设置菜单**，可设置显示背光亮度、自动待机时间、话筒啸叫抑制、蓝牙开启、开机音量、最大音量和菜单显示语言等参数。当此菜单激活时，短按[MENU]旋钮，可进入系统设置参数项界面。

菜单操作界面

- **输入增益设置菜单**，可设置话筒自动增益开启、各信号源的音频输入增益等参数。当此菜单激活时，短按[MENU]旋钮，可进入输入增益参数项设置界面。

- **模式调用菜单**，可调用缺省模式、演讲、影音和演出共四种，这四种模式均为工厂预置模式，其中缺省模式为系统开机默认模式。当此菜单激活时，短按[MENU]旋钮，可进入模式调用参数项界面。

- **话筒设置菜单**，可设置无线话筒的发射功率、无线话筒的载波频率和话筒的均衡等参数。当此菜单激活时，短按[MENU]旋钮，可进入话筒设置参数项界面。

- **话筒效果设置菜单**，可设置话筒的效果音量、混响和回音等参数。当此菜单激活时，短按[MENU]旋钮，可进入话筒效果设置参数项界面。

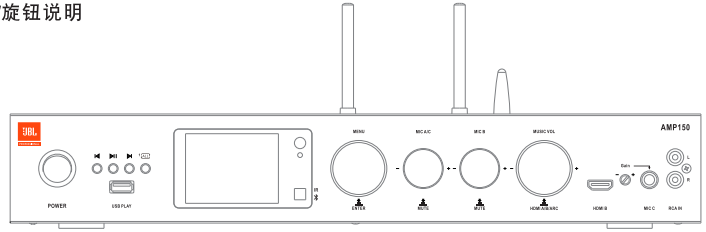
- **音乐通道设置菜单**，可设置各输入音频的均衡等参数。当此菜单激活时，短按[MENU]旋钮，可进入音乐设置参数项界面。

- **输出通道设置菜单**，可设置功放输出平衡、RCA输出音量和话筒开启时音乐音量等参数。当此菜单激活时，短按[MENU]旋钮，可进入输出设置参数项界面。

注意	1.圆形图标菜单项变大并变为橙色表示此菜单已被选中(即激活)，这时短按[MENU]旋钮可进入下级参数项设置界面。 2.文字菜单项（在参数项设置界面中）变为橙色表示此参数项已被选中，短按[MENU]旋钮可激活其参数（参数值变为橙色），这时旋转[MENU]旋钮可改变该参数，再短按[MENU]旋钮确认并退出。 3.在参数设置界面，请不要关闭电源，须返回待机界面后再关闭电源，否则可能会出现正在设置的部分参数无法保存。

第二章 操作说明

2.1 按键/旋钮说明



[⏮]**按键：** 在U盘播放时，短按此键可切换为播放上一曲。

[⏯]**按键：** 在U盘播放时，短按此键可暂停或播放当前曲目。

[⏭]**按键：** 在U盘播放时，短按此键可切换为播放下一曲。

[1 ALL]**按键：** 在U盘播放时，短按此键可循序切换为单曲循环和列表循环。

[MENU]/[ENTER]旋钮：

（1）长按3秒，显示界面旋转180度。

（2）在待机界面时，短按本旋钮可进入菜单操作界面。

（3）在菜单操作界面，旋转本旋钮可循环选择菜单项，再短按本旋钮可进入该菜单项的下一级参数项设置界面。

（4）在菜单参数项设置界面,旋转本旋钮可循序选择各参数项，再短按本旋钮可激活该参数值，这时旋转本旋钮改变参数值，再短按可确认退出本参数项激活状态。

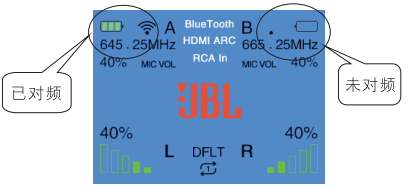
[MIC A/C]/[MUTE]旋钮： 旋转本旋钮直接调整话筒A/C的音量；长按本旋钮,话筒A/C静音,再长按静音解除。

[MIC B]/[MUTE]旋钮： 旋转本旋钮直接调整话筒B的音量；长按本旋钮,话筒B静音,再长按静音解除。

[MUSIC VOL]/[HDMI A/B/ARC]旋钮： 旋转本旋钮直接调整音乐输出音量；短按本旋钮可循序切换HDMI A、HDMI B 和 HDMI ARC输入。

2.2 无线话筒对频

AMP-H手持无线话筒无线对频： 长按话筒上的电源按键打开话筒之后，再短按电源按键，话筒将自动搜索并同步集成机设置的载波频率。对频成功后，集成机的显示屏上对应显示载波频率、电池电量、无线信号的强弱图示及无线话筒音量等，如右图所示。



AMP-H手持无线话筒红外对频： 拧下话筒的下管体和天线，开启电源，将红外接收管正对集成机的无线话筒红外发射窗，短按电源/对频按键，无线话筒会自动同步（即对频）集成机设置的话筒频率(详情见AMP-H使用说明)。

AMP-N无线便携话筒无线对频： 长按话筒上的电源按键开启电源之后，再短按电源/对频按键，话筒将自动搜索并同步集成机设置的载波频率。对频成功后，集成机的显示屏上对应显示载波频率、电池电量、无线信号的强弱图示等信息(对频时，尽量将话筒咪芯指向集成机的对频天线)。

AMP-N无线便携话筒红外对频： 开启话筒后，将话筒的红外对频窗对准集成机屏幕旁边的红外发射窗口，短按电源/对频按键，话筒会自动同步集成机设置的频率(详情见AMP-N使用说明)。

注：为了避免载波之间的干扰而使无线话筒出现异常噪声，尽可能将A和B的载波频率设置的尽量分开(在菜单“话筒设置”中可以设置话筒A和B的载波频率)。

仅适用于AMP-H手持无线话筒和AMP-N便携无线话筒。

2.3 菜单操作

当显示屏显示为待机界面时，短按[MENU]旋钮进入菜单操作界面，旋转[MENU]旋钮激活所需设置的菜单项，再短按[MENU]旋钮进入该菜单项所属的参数项设置界面。这时旋转[MENU]旋钮可选择各参数项，短按[MENU]旋钮可激活该参数项（其右边的参数值变为橙色，表示该参数值已可编辑，旋转[MENU]旋钮可调整该参数值）。

注：当参数项右边有此符号“ > ”时表示该参数项有下一级设置界面。选中该参数项后，短按[MENU]旋钮，可进入下一级界面。

2.3.1 系统设置

菜单操作界面

短按[MENU]旋钮

系统设置参数项界面

系统设置参数项列表如下：

参数项		说明	取值范围	备注
屏幕亮度		设置屏幕背光灯的亮度	1,2,3	
自动待机时间		长时间无播放信号时关闭功放模块电源	关，5~60min	
话筒啸叫抑制		设置话筒啸叫抑制强度	关，1，2，3	数字越大，抑制能力越强。
蓝牙开关		设置蓝牙开启和关闭	开，关	
蓝牙名称		重新命名本机的蓝牙名称	A~Z，0~9，-，_	最长为16位字节；默认蓝牙名称为JBL-AMP。
开机/最大音量设置	开机音乐音量	设置开机默认的音乐音量	0~“最大音乐音量”	“音乐最大音量”为下一个菜单项所设置的音乐最大限制音量。
	最大音乐音量	设置音乐最大限制音量	“开机音乐音量”~100	
	开机话筒A/C音量	设置开机默认的话筒A/C音量	0~“最大话筒A/C音量”	“话筒A/C最大音量”为下一个菜单项所设置的话筒A/C最大限制音量。
	最大话筒A/C音量	设置话筒A/C最大限制音量	“开机话筒A/C音量”~100	
	开机话筒B音量	设置开机默认的话筒B音量	0~“最大话筒B音量”	“话筒B最大音量”为下一个菜单项所设置的话筒B最大限制音量。
	最大话筒B音量	设置话筒B最大限制音量	“开机话筒B音量”~100	
	默认设置	恢复本级参数的出厂默认值	无	
	返回	返回上一级界面	无	
系统语言		设置菜单的显示语言	中文，En	En--英文
默认设置		恢复本级参数的出厂默认值	无	
返回		返回上一级界面	无	

说明：

1. **蓝牙重命名：**短按菜单项激活参数后，旋转[MENU]旋钮，选定字符，短按[MENU]旋钮确定第一位字符输入并自动进入第二位字符输输入，输入操作同第一位字符，如此操作，直到最后一个字符输入完毕，长按[MENU]旋钮结束蓝牙名称输入并保存、退出蓝牙更名。
2. **蓝牙连接：**由于蓝牙连接开关在出厂设置为关，故需在“系统设置”界面将蓝牙连接开关设置为开，之后用蓝牙设备搜索本机蓝牙名称“JBL-AMP”或者用户自定义的名称，点击连接即可。

2.3.2 输入增益设置

菜单操作界面

短按[MENU]旋钮

输入增益设置参数项设置界面

输入增益设置参数项列表如下：

参数项	说明	取值范围	备注
话筒自动增益	话筒自动增益开启或关闭	关，开	
RCA输入	设置RCA输入增益大小	0.0~10	dB
HDMI A输入	设置HDMI A输入增益大小	0.0~10	dB
HDMI B输入	设置HDMI B输入增益大小	0.0~10	dB
HDMI ARC输入	设置ARC回传输入增益大小	0.0~10	dB
USB输入	设置U盘播放输入增益大小	0.0~10	dB
蓝牙输入	设置蓝牙输入增益大小	0.0~10	dB
默认设置	恢复本级参数的出厂默认值	无	
返回	返回上一级界面	无	

2.3.3 模式调用

菜单操作界面

短按[MENU]旋钮

模式调用参数设置界面

本机预置4个模式：默认模式（DFLT）/演讲（SPCH）/影音（MUSC）/演出（PERF），其中“默认模式”为出厂预置模式。当预置模式被调用时，将在待机界面的LOGO下方显示相应模式的英文简称。

2.3.4 话筒设置

菜单操作界面

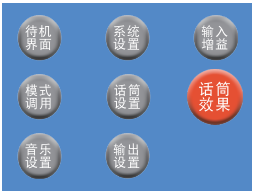
短按[MENU]旋钮

话筒设置参数设置界面

话筒设置参数项列表如下：

参数项		说明	取值范围	备注
无线话筒发射功率		调整无线话筒工作距离，发射功率低时，工作距离较短；发射功率高时，工作距离较远	高，低	设置无线话筒发射功率后，无线话筒需要重新对频以更新其发射功率
话筒A频率		设置话筒A的载波频率	645.25MHz~664.25MHz	
话筒B频率		设置话筒B的载波频率	665.25MHz~684.25MHz	
话筒A/C均衡设置	低切频率	设置话筒频响的下限频率	关，19.7~303Hz	
	高切频率	设置话筒频响的上限频率	关，5990Hz~19800Hz	
	均衡旁通	均衡旁通为关时，均衡设置有效；均衡旁通为开时，均衡设置无效	关，开	
	均衡	均衡段序，共7段	1~7	
	频率	本段均衡的中心频率	19.7Hz~20.2kHz	
	增益	本段均衡的增益	-24.0~+12.0dB	
	带宽	本段均衡的带宽	0.4~128	
	默认设置	恢复本级参数的出厂默认值	无	
	返回	返回上一级界面	无	
话筒B均衡设置	低切频率	设置话筒频响的下限频率	关，19.7~303Hz	
	高切频率	设置话筒频响的上限频率	关，5990Hz~19800Hz	
	均衡旁通	均衡旁通为关时，均衡设置有效；均衡旁通为开时，均衡设置无效	关，开	
	均衡	均衡段序，共7段	1~7	
	频率	本段均衡的中心频率	19.7Hz~20.2kHz	
	增益	本段均衡的增益	-24.0~+12.0dB	
	带宽	本段均衡的带宽	0.4~128	
	默认设置	恢复本级参数的出厂默认值	无	
	返回	返回上一级界面	无	
默认设置		恢复本级参数的出厂默认值	无	
返回		返回上一级界面	无	

2.3.5 话筒效果设置



菜单操作界面

短按[MENU]旋钮

话筒效果参数设置界面

话筒效果参数项列表如下：

参数项		说明	取值范围	备注
效果音量		设置效果声音量（含混响和回音）	0~100	百分比
混响设置	混响音量	设置混响的音量	0~200%	
	混响直达声音量	设置混响中直达声的音量	0~200%	
	混响预延时	设置混响预延时的时间	0~80ms	
	混响时间	设置混响的时间	0~9200ms	
	混响低切	设置混响频率的下限	19.7~303Hz	
	默认设置	恢复本级参数的出厂默认值	无	
	返回	返回上一级界面	无	
回声设置	回声音量	设置回声的音量	0~200%	
	回声直达声音量	设置回声中直达声的音量	0~200%	
	回声预延时	设置回声预延时的时间	0~80ms	
	回声延时	设置回声延时的时间	0~320ms	
	回声次数	设置回声的次数	1~90%	
	回声高切	设置回声频率的上限	5990Hz~20200Hz	
	默认设置	恢复本级参数的出厂默认值	无	
	返回	返回上一级界面	无	
返回		返回上一级界面	无	

2.3.6 音乐通道设置

菜单操作界面

短按[MENU]旋钮

音乐设置参数设置界面

音乐设置参数项列表如下：

参数项		说明	取值范围	备注
RCA均衡设置	低切频率	设置RCA输入的频响下限频率	关，19.7~303Hz	
	均衡旁通	均衡旁通为关时，均衡设置有效；均衡旁通为开时，均衡设置无效	关，开	
	均衡	均衡段序，共7段	1~7	
	频率	本段均衡的中心频率	19.7Hz~20.2kHz	
	增益	本段均衡的增益	-24.0~+12.0dB	
	带宽	本段均衡的带宽	0.4~128	
	默认设置	恢复本级参数的出厂默认值	无	
	返回	返回上一级界面	无	
HDMI 均衡设置	低切频率	设置HDMI 输入的音频下限频率	关，19.7~303Hz	
	均衡旁通	均衡旁通为关时，均衡设置有效；均衡旁通为开时，均衡设置无效	关，开	
	均衡	均衡段序，共7段	1~7	
	频率	本段均衡的中心频率	19.7Hz~20.2kHz	

未完，待续

续上表

参数项		说明	取值范围	备注
HDMI 均衡设置	增益	本段均衡的增益	-24.0~+12.0dB	
	带宽	本段均衡的带宽	0.4~128	
	默认设置	恢复本级参数的出厂默认值	无	
	返回	返回上一级界面	无	
USB/蓝牙均衡设置	低切频率	设置USB/蓝牙输入的音频下限频率	关，19.7~303Hz	
	均衡旁通	均衡旁通为关时，均衡设置有效；均衡旁通为开时，均衡设置无效	关，开	
	均衡	均衡段序，共7段	1~7	
	频率	本段均衡的中心频率	19.7Hz~20.2kHz	
	增益	本段均衡的增益	-24.0~+12.0dB	
	带宽	本段均衡的带宽	0.4~128	
	默认设置	恢复本级参数的出厂默认值	无	
	返回	返回上一级界面	无	
返回		返回上一级界面	无	

2.3.7 输出设置

菜单操作界面

短按[MENU]旋钮

输出设置参数设置界面

输出设置参数项列表如下：

参数项	说明	取值范围	备注
功放输出平衡	设置总输出的左右通道音量配比	-100~+100	"-100" 表示左通道音量最大，右通道音量为零 "+100" 表示左通道音量为零，右通道音量最大
RCA输出音量	设置RCA输出的音量大小	0~200%	
自动闪避(音乐输出量)	话筒开启时，音乐输出的音量大小	0~100	输出为当前音乐音量的百分比
外接音箱阻抗	外接音箱的额定阻抗	8欧，4欧	
默认设置	恢复本级参数的出厂默认值	无	
返回	返回上一级界面	无	

2.4 恢复出厂设置

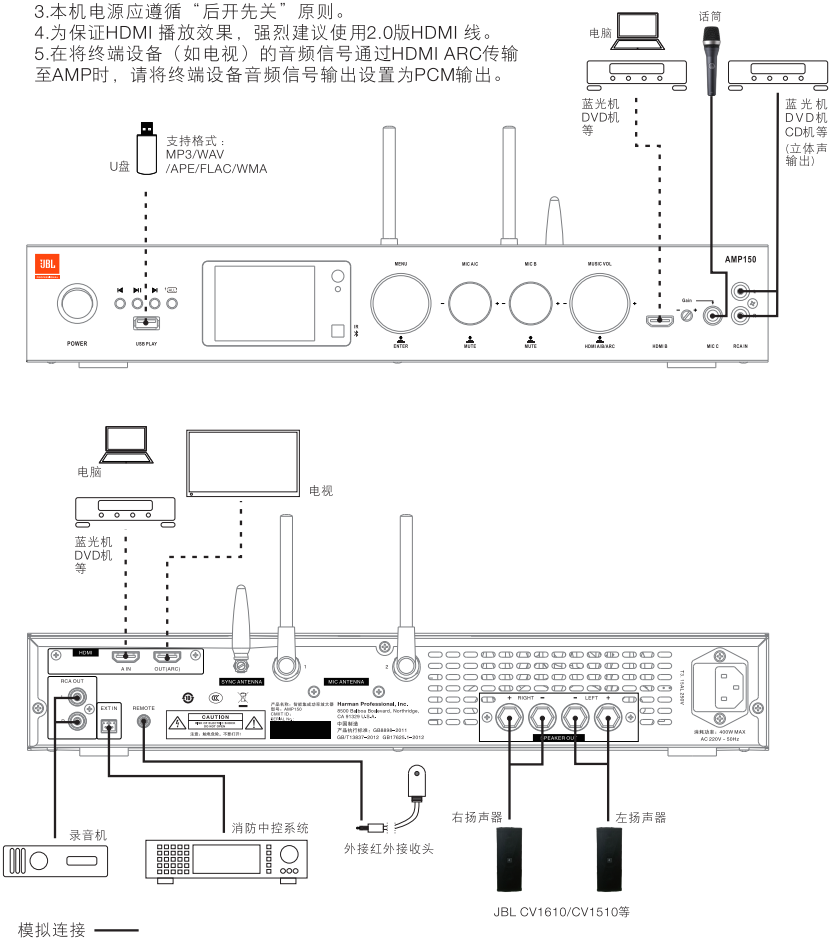
同时按下[MIC A/C]+[MIC B]旋钮开机，系统自动进入恢复出厂设置，恢复完毕进入待机界面。

第三章 系统连接

3.1 系统连接

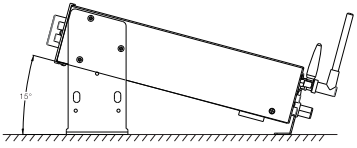
系统连接请参考以下“常用系统连接示意图”。

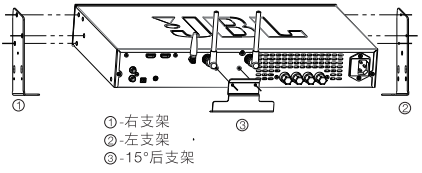
注意:
1.进行系统连接前，请确保所有设备均已断开电源。
2.请将所有设备的音量控件调至最低位，再打开本机电源。
3.本机电源应遵循“后开先关”原则。
4.为保证HDMI 播放效果，强烈建议使用2.0版HDMI 线。
5.在将终端设备（如电视）的音频信号通过HDMI ARC传输至AMP时，请将终端设备音频信号输出设置为PCM输出。



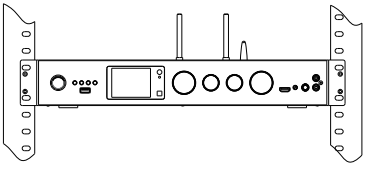
3.2 安装方式说明

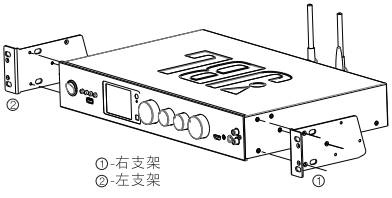
3.2.1 桌面15°安装



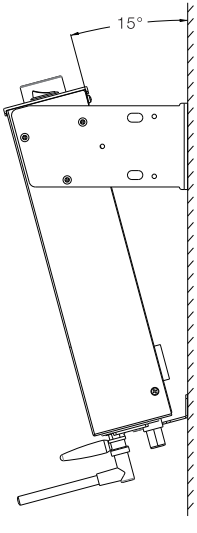


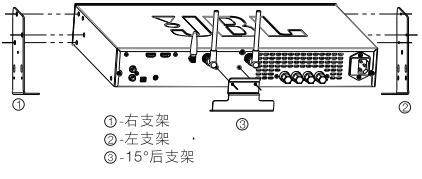
3.2.2 机柜安装

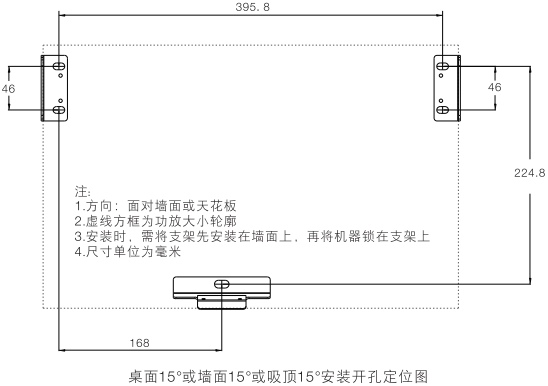




3.2.3 墙面15°安装

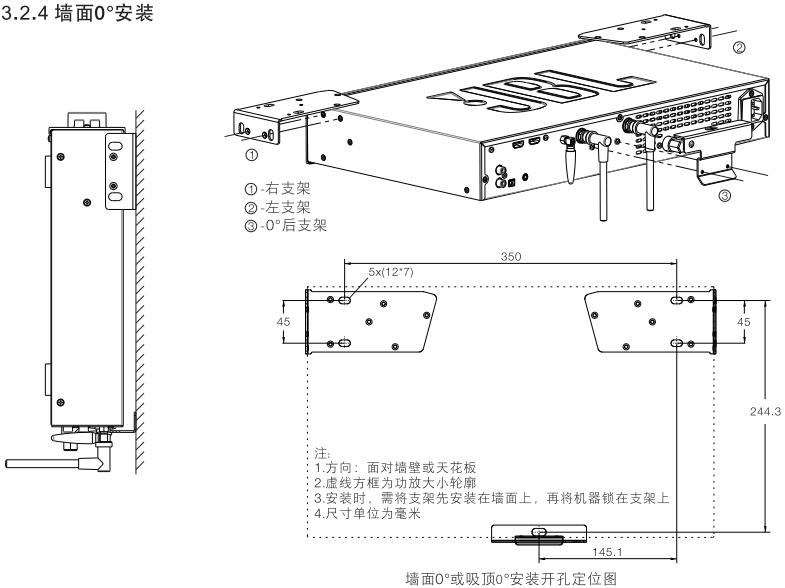






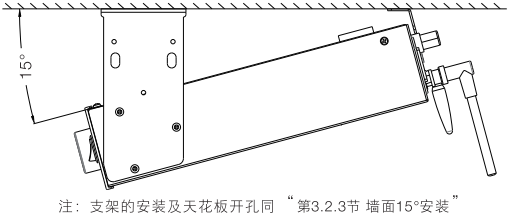
桌面15°或墙面15°或吸顶15°安装开孔定位图

3.2.4 墙面0°安装



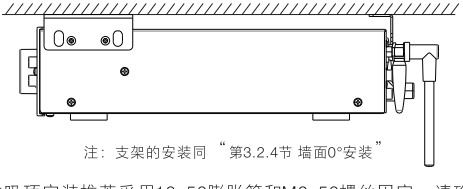
墙面0°或吸顶0°安装开孔定位图

3.2.5 吸顶15°安装



注：支架的安装及天花板开孔同 “第3.2.3节 墙面15°安装”

3.2.6 吸顶0°安装



注：支架的安装同 “第3.2.4节 墙面0°安装”

重要注意事项：

1.为确保稳固，墙面或吸顶安装推荐采用10x50膨胀管和M6x50螺丝固定。请确保墙壁和天花的承托力能负荷主机的重量。哈曼不负责因安装不当造成的直接或间接损失。
2.安装时，需将支架先安装在墙面上，再将机器锁在支架上。
3.安装后，请注意调整无线话筒的接收天线和对频天线，不要靠近，避免相互干扰，影响对频。

第四章 菜单结构

菜单结构：

- 系统设置
  - 屏幕亮度
  - 自动待机时间
  - 话筒啸叫抑制
  - 蓝牙开关
  - 蓝牙名称
  - 开机/最大音量设置
    - 开机音乐音量
    - 最大音乐音量
    - 开机话筒A/C音量
    - 最大话筒A/C音量
    - 开机话筒B音量
    - 最大话筒B音量
    - 默认设置
    - 返回
  - 系统语言
  - 默认设置
  - 返回
- 输入增益设置
  - 话筒自动增益
  - RCA输入
  - HDMI A输入
  - HDMI B输入
  - HDMI ARC输入
  - USB输入
  - 蓝牙输入
  - 默认设置
  - 返回
- 模式调用
  - 模式
  - 返回
- 话筒设置
  - 无线话筒发射功率
  - 话筒A频率
  - 话筒B频率
  - 话筒A/C均衡设置
    - 低切频率
    - 高切频率
    - 均衡旁通
    - 均衡 …… 频率
    - 默认设置 …… 增益
    - 返回 …… 带宽
  - 话筒B均衡设置
    - 低切频率
    - 高切频率
    - 均衡旁通
    - 均衡 …… 频率
    - 默认设置 …… 增益
    - 返回 …… 带宽
  - 默认设置
  - 返回
- 话筒效果设置
  - 效果音量
  - 混响设置
    - 混响音量
    - 混响直达音量
    - 混响预延时
    - 混响时间
    - 混响低切
    - 默认设置
    - 返回
  - 回声设置
    - 回声音量
    - 回声直达音量
    - 回声预延时
    - 回声延时
    - 回声次数
    - 回声高切
    - 默认设置
    - 返回
  - 返回
- 音乐设置
  - RCA均衡设置
    - 低切频率
    - 均衡旁通
    - 均衡 …… 频率
    - 默认设置 …… 增益
    - 返回 …… 带宽
  - HDMI均衡设置
    - 低切频率
    - 均衡旁通
    - 均衡 …… 频率
    - 默认设置 …… 增益
    - 返回 …… 带宽
  - USB/蓝牙均衡设置
    - 低切频率
    - 均衡旁通
    - 均衡 …… 频率
    - 默认设置 …… 增益
    - 返回 …… 带宽
  - 返回
- 输出设置
  - 功放输出平衡
  - RCA输出音量
  - 自动闪避(音乐输出量)
  - 外接音箱阻抗
  - 默认设置
  - 返回

第五章 遥控器说明

IRDA：基于标准 IRDA 协议

遥控按键功能如下：

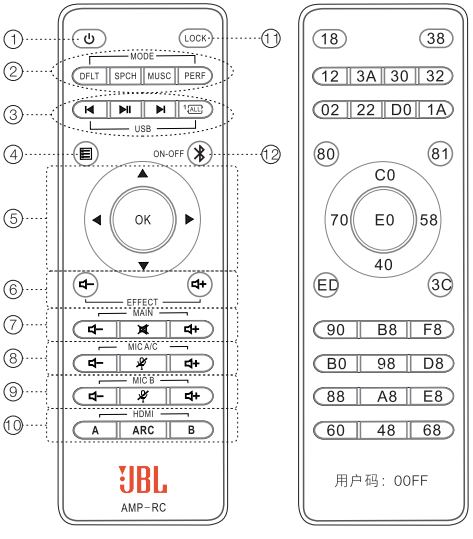
① **待机按键**
按待机键，AMP进入待机状态，待机状态指示黄灯亮，显示屏关闭；再按待机键，待机状态指示黄灯灭，AMP退出待机状态。

② **模式调用区**
DFLT为出厂默认模式，SPCH/MUSC/PERF分别对应演讲、影音和演出。

③ **USB播放操作区**
从左到右分别对应上一曲、播放/暂停、下一曲和循环设置按键。

④ **菜单设置**
按下进入菜单设置界面，再按返回待机界面；在菜单编辑时，按下返回待机界面。

⑤ **菜单项操作区**
▲-向上导航按键，向上移动选择菜单项；▼-向下导航按键，向下移动选择菜单项；◀-在菜单操作界面，向左选择菜单项，在设置参数时，减少参数值；▶-在菜单操作界面，向右选择菜单项，在设置参数时，增加参数值。
注：蓝牙命名时，向上/向下导航键（▲/▼）为撤销/确认本位字符，向左/向右导航键（◀/▶）为选择字符，短按OK键为结束命名输入并退出蓝牙命名操作。



遥控代码

⑥ **效果音量设置区**
效果音量减少；效果音量增加。

⑦ **音乐音量设置区**
音乐音量减少；音乐音量增加；总输出静音。

⑧ **话筒A/C音量设置区**
话筒音量减少；话筒音量增加；话筒静音。

⑨ **话筒B音量设置区**
话筒音量减少；话筒音量增加；话筒静音。

⑩ **HDMI 输入切换设置区**

⑪ **锁机按键**
按锁定按键一次，AMP主机锁定;再按锁定按键，AMP主机解锁。

⑫ **蓝牙开启/关闭**
短按此按键进行蓝牙功能开启和关闭切换。

注意：
1.当用遥控机进行锁定AMP面板按键后（即按下遥控器锁机按键），必须用遥控器开锁（即再按一次遥控器锁机按键），才能使AMP的面板按键起作用。
2.当用遥控机进行待机操作后（即按下遥控器的待机按键），必须用遥控器才能取消待机（即再按一次遥控器待机按键）。当AMP处于待机模式时，将关闭功率输出模块的供电和显示屏的背光，减少耗电，同时点亮显示屏右边的待机指示灯（黄灯）。

第六章 规格参数

		AMP150	AMP350
输入接口			
USB/蓝牙输入 X 1个		B型USB母座	
立体声输入（非平衡）X 1组		RCA 座	
HDMI 输入 X 2个		HDMI 座	
ARC音频输入 X 1个		HDMI 座	
1/4 JACK输入（平衡） X 1个		TRS 座	
外接红外遥控接口 X 1个		3.5 座	
EXT In输入（短路触发） X 1个		2PIN 凤凰座	
输出接口			
HDMI 输出 X 1个		HDMI 座	
立体声混合输出 X 1组		RCA 座	
音箱接线柱输出（立体声） X 1组		接线柱	
技术规格			
信噪比(SNR)	RCA 输入，8欧负载，A计权	⩾85dB	
	1/4 TRS 输入，8欧负载	⩾75dB	
频率响应(Frequency Response)	RCA 输入，8欧负载，1W，20~20KHz	-1dB~+1dB	
	1/4 TRS 输入，8欧负载，1W，50~14KHz	-3dB~+1dB	
失真(THD+N)	RCA 输入，8欧负载，1KHz，额定功率输出，带宽20~20KHz	⩽ 1%	
	1/4 TRS 输入，8欧负载，1KHz，额定功率输出，带宽20~20KHz	⩽ 1%	
输入阻抗	RCA 输入，f=1KHz	10K ohms	
	1/4 TRS 输入，f=1KHz	3.6K ohms	
额定功率(Rated Power)	THD+N ⩽ 1%，8欧负载，带宽20~20KHz	150w	350w
USB	音频格式	MP3,WAV,APE,FLAC,WMA	
	文件系统	FAT16,FAT32, ExFAT/Fat64	
	最大容量	32G	
蓝牙	版本	V4.2/2.1+EDR	
HDMI	版本	1.4/2.0	
	支持格式	最高4K/60Hz（8bit）和4K/30Hz（16bit）	
电源要求		AC 220V ~ 50Hz	
尺寸		宽428.4*深266.5*高67.7mm(深度不含天线和旋钮）	
净重		4.4Kg	5.0Kg
毛重		6.3Kg	6.9Kg

JBL AMP SERIES

智能集成功率放大器

用户手册

Issued:07/2020

JBL AMP SERIES
AMP150
AMP350

Intelligent Integrated Amplifier

User Manual

Table of Contents

Important Safety Instructions

CAUTION

RISK OF ELECTRIC SHOCK
DO NOT OPEN

ATTENTION: RISQUE DE CHOC ELECTRIQUE - NE PAS OUVRIR

WARNING: TO REDUCE THE RISK OF FIRE OR ELECTRIC SHOCK DO NOT EXPOSE THIS EQUIPMENT TO RAIN OR MOISTURE

The above symbols are international electronic product warning signs. The triangle symbol with lightning pattern is used to remind the user that there is "dangerous voltage" in the power amplifier, which may lead to electric shock. The triangle symbol with exclamation mark is used to remind the user to pay attention to and follow important operation and maintenance (repair) instructions in the manual.
Such marks are used to warn the user that there are no user repairable parts in the power amplifier. Do not open the power amplifier without authorization, and do not carry out any maintenance on the power amplifier without authorization. In case of maintenance and repair, please consult the relevant qualified professionals. If you open the equipment chassis without authorization, the warranty terms will be invalid. The power amplifier is strictly prohibited to be exposed to rain and moisture. In case of liquid infiltration, shut down the equipment immediately and return it back to the agent for maintenance; in case of thunderstorm, disconnect the power supply to prevent the equipment from being damaged.

Safety Instructions

Please pay attention to the safety instructions here for users who use equipment with the power cord!
Warning: This equipment must be connected to a power socket with grounding protection!
The cables in the power cord are distinguished by the following colors:

Yellow green - ground wire
Blue - neutral wire
Brown - live wire

If the cable color is inconsistent with that of the terminal in the power socket to be connected, please follow the following steps:

- Connect the yellow-green cable to the terminal marked with E, or grounding symbol, or the green or yellow-green terminal in the power socket;
- Connect the blue cable to the terminal marked with N or the black terminal in the power socket;
- Connect the brown cable to the terminal marked with L or the red terminal in the power socket.

Depending on the power supply at the installation site, the equipment may require different power cords or connectors. If you need to replace the connector, please consult the relevant qualified professionals and refer to the relevant information in the table below.
The yellow-green cable must be connected to the equipment chassis.

Conductor		Cable color	
		General standards	Other standards
L	Live wire	Brown	Black
N	Neutral wire	Blue	White
E	Ground wire	Green / yellow	Green

Warning: If the grounding protection is poor, the equipment or system connected may fail, resulting in a full-load line voltage between the equipment chassis and the ground. Once a person touches the chassis and the ground at the same time, it may cause serious injury or even death.

Safety Instructions

Keep these Safety Instructions.
Pay attention to all warning information.
Comply with all operation specifications.
Do not spray liquid around the equipment. Do not place liquid containers (such as vases) above the equipment.
Use only dry cloth to clean the equipment.
Do not block the heat sink. Install the equipment according to the manufacturer's instructions.
Do not install the equipment near a heat source, such as radiator, heat regulator, furnace or other heating equipment (including power amplifier).
Accessories and fittings specified by the manufacturer must be used.
Unplug the power socket in case of thunderstorm or long-term equipment shutdown.
Please follow the safety specifications for polarized plugs or grounding plugs. The polarized plug consists of two metal prongs with different widths. The grounding plug is composed of two-pole male tab and grounding male tab with safety protection function. If the plug provided is incompatible with the power socket, please replace the power socket. Please consult an electrical engineer for replacement of power sockets.
Take care to protect the power cord from trampling or crushing. Pay special attention to protecting cables at plug end, socket end and equipment end.
Movable cabinets, bases, tripods, supports and workbenches designated by the manufacturer or sold with the equipment must be used. When using the movable cabinet, please be careful to prevent the cabinet and equipment from overturning. In case of maintenance and repair, please consult the relevant qualified maintenance personnel. In case of any of the following situations, the equipment must be overhauled: cable or plug damage, liquid splashing, foreign materials falling into chassis, rain and moisture, abnormal operation or equipment falling, etc.

Power switch: For equipment with a power switch, turn off the power switch but do not completely disconnect the equipment from the power supply.
Power off setting: The power socket shall be available at any time. For the equipment installed in cabinets or unable to be connected by plugs, the all-pole power switch with contact spacing not less than 3mm shall be provided in equipment cabinets or buildings.
For equipment with an external fuse interface, replace only with fuses of the same type and specification.
Multiple input voltages: Depending on the power supply at the installation site, the equipment may require different power cords or connectors to ensure that the power supply meets the requirements of the power type indicated on the back panel of the equipment. For information or services related to electricity, please consult relevant qualified personnel to avoid fire or electric shock.

Chapter I Product Introduction

1.1 Brief description

AMP150/350 is an intelligent integrated amplifier composed of power amplifier, microphone and processor. There are 150W and 350W power options available. It is equipped with a wireless handheld microphone (AMP-H), wireless hands-free microphone (AMP-N), and 5.25" (CV1510) and 6.5" (CV1610) loudspeakers to meet the needs of classrooms, conference rooms and multi-function rooms with different sizes.

Note: The wireless microphone and speaker need to be purchased separately.

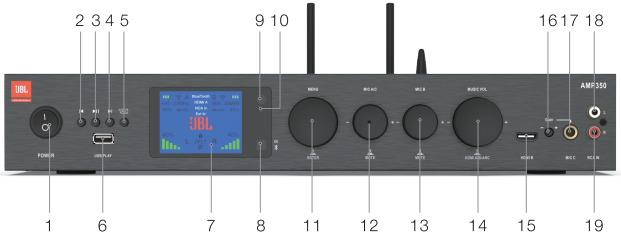
1.2 Features

- Automatic gain control function
- 7-band parametric equalizer available for each microphone channel and music channel
- RCA input/output level adjustment
- Maximum volume setting
- 32-bit DSP audio digital signal processing
- Preset: 4 scene modes
- Menu in Chinese and English languages are available
- Automatic feedback suppression, multi-level adjustable
- 2.8" color screen with adjustable brightness
- Life-safety linkage to external control system (low-level: mute)
- Support dual wireless input (wireless handheld microphone and wireless hands-free microphone), smart connection
- Support wired microphone input
- Automatic standby, green energy saving
- Infrared remote control with lock control, convenient and safe
- Microphone high/low-pass, ECHO and REVERB adjustment
- Device name in Bluetooth can be renamed for specific device pairing
- Bluetooth can be renamed according to the usage scenario
- Multiple installation methods available for different installation requirements
- Menu display orientation can be rotated 180° for different installation methods
- Different input and output connections are available

1.3 Packing list

- Intelligent integrated amplifier × 1
- National standard power cord × 1
- Operation instruction × 1
- Remote controller × 1
- AAA batteries × 2
- Antenna × 3
- Mounting kit × 1 (side support × 2 + rear support × 2)

1.4 Introduction to panel



1 - Power switch

2- (USB drive playback) Previous

3- (USB drive playback) Play / Pause

4- (USB drive playback) Next

5- (USB drive playback) Single Loop / All Loop

6- USB port

7- 2.8" color screen

8 - Infrared remote control window

9- Wireless microphone infrared frequency pairing window

10- Standby status indicator

11- [MENU]/[ENTER] Enter menu and confirm

12- [MIC A/C]/[MUTE] microphone A/C volume and mute

13- [MIC B]/[MUTE] microphone B volume and mute

14- [MUSIC VOL]/[HDMI A/B/ARC] music volume adjustment (including USB, Bluetooth, HDMI and RCA volume) / HDMI A/B/ARC input switch

15- HDMI B input

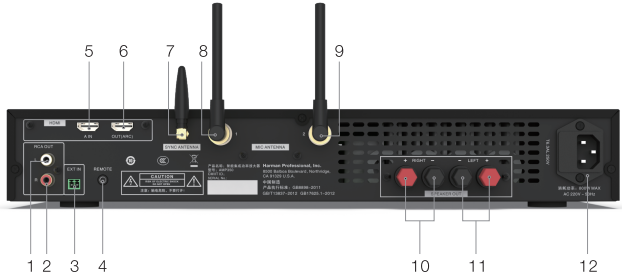
16- Microphone C input level adjustment potentiometer

17- Microphone C input jack (TRS)

18- RCA input left channel (L)

19- RCA input right channel (R)

1.5 Introduction to rear panel



1- RCA output left channel (L)

2- RCA output right channel (R)

3- Life-safety alarm signal interface

4- External infrared remote control input port

5- HDMI A input

6- HDMI ARC output (TV return)

7- Wireless microphone pairing antenna

8- Wireless microphone B antenna

9- Wireless microphone A antenna

10- Audio output (right channel, connected to speaker R)

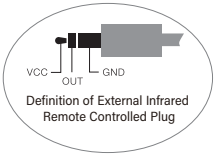
11- Audio output (left channel, connected to speaker L)

12- Power socket

Note:

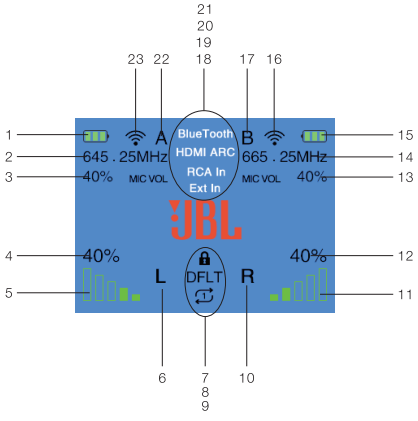
1) Life-safety alarm signal interface - when low level is detected, the equipment will start to mute.

2) The pin definition of the external infrared remote control input port (interface 4) is shown in the figure to the left.



Definition of External Infrared Remote Controlled Plug

1.6 Instructions for display icons



1- Wireless microphone A battery indicator

2- Wireless microphone A carrier frequency

3- Wireless microphone A volume indicator

4- Music volume left channel indicator

5- Music volume left channel graphic sign; one bar represents 20% of the total volume

6- Music volume left channel

7- Panel lock indicator (displayed when the panel is locked)

8- Preset modes: "DFLT (default)", "SPCH (speech)", "MUSC (music)" and "PERF (performance)"

9- Current mode of USB drive playback: indicates single track loop and indicates all tracks loop

10- Music volume right channel

11- Music volume right channel graphic sign; one bar represents 20% of the total volume

12- Music volume right channel indicator

13- Wireless microphone B volume indicator

14- Wireless microphone B carrier frequency

15- Wireless microphone B battery indicator

16- Wireless microphone B signal strength indicator

17- Wireless microphone B indicator

18/19/20/21- Indicator with current signal source input (seven sources of input: Ext In, RCA In, HDMI A or HDMI B or HDMI ARC, Bluetooth or USB)

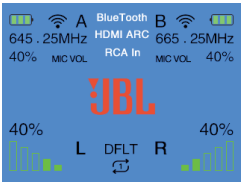
22- Wireless microphone A indicator

23- Wireless microphone A signal strength indicator

1.7 Instructions for menu icons

When the display screen displays the standby interface (see the figure to the right), short press the [MENU] knob to enter the menu interface; then, rotate the [MENU] knob to select different menu items (enlarged and displayed in orange), as shown in the figure to the right, and then short press the [MENU] knob again to enter the menu parameter setting interface.

Icons on the menu interface are described as follows:



(Standby)

Menu operation interface

- **Back to standby mode:** When this menu is activated, short press the [MENU] knob to return to standby mode.

- **System Setting:** Parameters such as display backlight brightness, automatic standby time, microphone feedback exterminator, Bluetooth on, power on volume, maximum volume and menu display language can be set here. If this menu is activated, short press the [MENU] knob to enter the system parameter settings interface.

- **Input Gain Setting:** Parameters such as microphone automatic gain ON and audio input gain of all signal sources can be set here. If this menu is activated, short press the [MENU] knob to enter the input gain parameter settings.

- **Setting Output PEQ Mode:** Four modes can be called upon here: DELT(default) SPCH(Speech), MUSC(Music) and PERF (Performance), all of which are factory preset modes, with default mode being the system default. If this menu is activated, short press the [MENU] knob to enter the mode parameter settings.

- **Mic Setting :** Parameters such as wireless microphone transmitting power, carrier frequency and microphone equalization can be set here. If this menu is activated, short press the [MENU] knob to enter the microphone parameter settings.

- **Effect Setting :** Parameters such as microphone effect volume, reverberation and echo can be set here. If this menu is activated, short press the [MENU] knob to enter the microphone effect parameter settings.

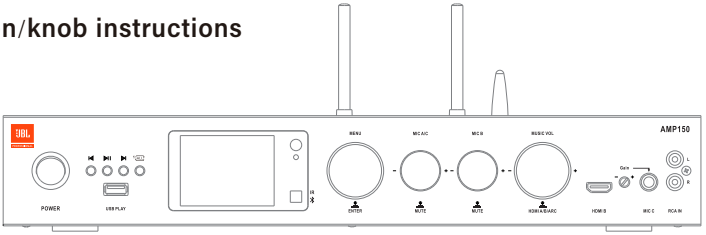
- **Music Setting :** Parameters such as equalization of each input audio can be set here. If this menu is activated, short press the [MENU] knob to enter the music parameter settings.

- **Mix Out Setting :** Parameters such as power amplifier output balance, RCA output volume and music volume when microphone is turned on can be set here. If this menu is activated, short press the [MENU] knob to enter the output parameter settings.

Attention	1. If the circle icon becomes larger and turns orange, it indicates that the menu has been selected (i.e., activated); you can then short press the [MENU] knob to enter the next parameter settings interface. 2. If the text menu item (in the parameter settings interface) turns orange, it indicates that the parameter has been selected; you can then short press the [MENU] knob to activate its parameter (the parameter value turns orange), then rotate the [MENU] knob to change the parameter, and short press the [MENU] knob to confirm and exit. 3. Please do not turn off the power in the parameter settings. You must return to the standby interface and turn off the power (otherwise, some parameters being set may not be saved).

Chapter II Operation Instructions

2.1 Button/knob instructions



[⏮] **Button**: When playing from the USB flash drive, short press this button to play the previous track.

[⏯] **Button**: When playing from the USB flash drive, short press this button to pause or play the current track.

[⏭] **Button**: When playing from the USB flash drive, short press this button to play the next track.

[1 ALL] **Button**: When playing from the USB flash drive, short press this button to loop a single track or all tracks in sequence.

[MENU]/[ENTER] knob:

(1) Long press for 3 seconds to rotate display interface 180°.

(2) In the standby interface, short press the knob to enter the menu interface.

(3) In menu interface, rotate the knob to select the menu item circularly, and then short press the knob to enter the next parameter settings interface in the menu.

(4) In the parameter settings interface, rotate the knob to select each parameter in sequence, and then short press the knob to activate the parameter value; then, rotate the knob to change the parameter value, and then short press it again to confirm and exit the active state of the parameter.

[MIC A/C]/[MUTE] knob: Rotate the knob to directly adjust the volume of MIC A/C; long press the knob to mute MIC A/C, and then long press it again to release the mute mode.

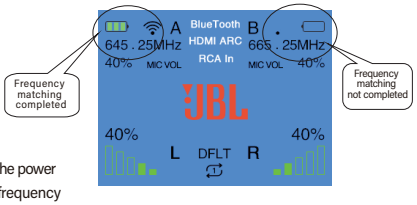
[MIC B]/[MUTE] knob: Rotate the knob to directly adjust the volume of MIC B; long press the knob to mute MIC B, and then long press it again to release the mute mode.

[MUSIC VOL]/[HDMI A/B/ARC] knob: Rotate the knob to directly adjust the music volume; short press this knob to switch HDMI A, HDMI B and HDMI ARC inputs in sequence.

2.2 Wireless microphone frequency matching

Wireless frequency matching of AMP-H wireless handheld microphone: Long press the power button on the microphone to turn on the microphone, and then short press the power button, the microphone will automatically search and synchronize the carrier frequency set by the integrated amplifier. After successful frequency matching, the display screen of the integrated amplifier will show the carrier frequency, battery capacity, wireless signal strength and wireless microphone volume, as shown in the figure to the right.

Infrared frequency matching of AMP-H wireless handheld microphone: Unscrew the lower tube and antenna of the microphone, then turn on the power supply and point the infrared receiver tube of the wireless microphone to the infrared emission window on the integrated amplifier. Short press the power/frequency matching button and the wireless microphone will automatically synchronize (i.e., frequency match) the microphone frequency set by the integrated amplifier (see AMP-H operation instructions for details).



Wireless frequency matching of AMP-N wireless hands-free microphone: Long press the power button on the microphone to turn on the power, and then short press the power/frequency matching button. The microphone will automatically search and synchronize the carrier frequency set by the integrated amplifier. After successful frequency matching, the display screen of the integrated amplifier will show the carrier frequency, battery capacity, wireless signal strength and other information (during frequency matching, try to point the microphone core to the frequency matching antenna of the integrated amplifier).

Infrared frequency matching of AMP-N wireless hands-free microphone: After turning on the microphone, align the infrared frequency matching window of the microphone to the infrared emission window next to the integrated amplifier screen. Short press the power/frequency matching button and the microphone will automatically synchronize the frequency set by the integrated amplifier (see AMP-N operation instructions for details).

Note: In order to avoid abnormal noise of the wireless microphone caused by interference between carriers, the carrier frequencies of A and B shall be set as far apart as possible (the carrier frequency of MIC A and B can be set in "microphone settings" menu).

Only applicable to AMP-H wireless handheld microphone and AMP-N wireless hands-free microphone.

2.3 Menu operation

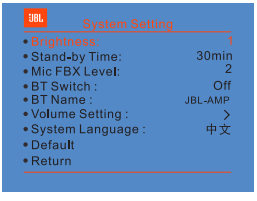
When the display screen is in standby mode, short press the [MENU] knob to enter the menu. Rotate the [MENU] knob to activate the menu item to be set, and then short press the [MENU] knob to enter the parameter settings interface in the menu. Then, rotate the [MENU] knob to select parameters, and short press the [MENU] knob to activate the parameter (the parameter value on the right becomes orange, indicating that the parameter value is editable, and the parameter value can be adjusted by rotating the [MENU] knob).

Note: When the symbol ">" is on the right side of the parameter, it indicates that the parameter has a submenu. After selecting the parameter, short press the [MENU] knob to enter the parameter's submenu.

2.3.1 System Setting

Menu operation interface

Short press the [MENU] knob



System Setting parameters interface

The list of System Setting parameters is as follows:

Parameters		Description	Value range	Remarks
Brightness		Set the brightness of screen backlight	1 , 2 , 3	
Stand-by Time		Turn off the power supply of the amplifier module when there is no playback signal for a period of time	Off , 5~60 min	
Mic FBX Level		Set microphone feedback exterminator strength	Off , 1 , 2 , 3	The larger the number, the stronger the suppression ability.
BT Switch		Set Bluetooth On or Off	On, Off	
BT Name		Rename the Bluetooth device	A~Z, 0~9, -, _	The maximum length is 16 bytes; the default Bluetooth name is JBL-AMP.
Volume Setting	Music Init Volume	Set the default music volume at power-on	0~"Music Maximum Volume"	"Music Maximum Volume" is the maximum limit volume set by the next menu item.
	Music Maximum Volume	Set the maximum limit volume	"Music Init Volume"~100	
	MIC A/C Init Volume	Set the default MIC A/C volume at power-on	0~"MIC A/C Maximum Volume"	"MIC A/C Maximum Volume" is the maximum MIC A/C limit volume set by the next menu item.
	MIC A/C Maximum Volume	Set the maximum MIC A/C limit volume	"MIC A/C Init Volume"~100	
	MIC B Init Volume	Set the default MIC B volume at power-on	0~"MIC B Maximum Volume"	"Maximum MIC B Volume" is the maximum MIC B limit volume set by the next menu item.
	MIC B Maximum Volume	Set the maximum MIC B limit volume	"MIC B Init Volume"~100	
	Default	Restore the factory default parameters at this level	None	
	Return	Return to the previous interface	None	
System Language		Set the display language of the menu	中文，English	中文-Chinese En-English
Default		Restore the factory default parameters at this level	None	
Return		Return to the previous interface	None	

Description:

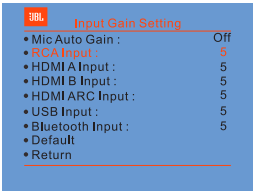
1. Bluetooth renaming: Short press the menu item to activate the parameter, and then rotate the [MENU] knob to select the character. Short press the [MENU] knob again to confirm the input of the first character and move to the next character (the input operation is the same as that of the first character). Do this until the input of the last character is completed, and then long press the [MENU] knob to end the Bluetooth name input. Save and exit the Bluetooth renaming menu.

2. Bluetooth connection: Since Bluetooth is turned off by default, it is necessary to turn Bluetooth on in the "System Setting" interface. Then, search for the Bluetooth name (i.e., "JBL-AMP" or the user-defined Bluetooth device name if it has been edited) and click Connect.

2.3.2 Input Gain Setting

Menu operation interface

Short press the [MENU] knob



Input Gain Setting parameters interface

The list of Input Gain Setting parameters is as follows:

Parameters	Description	Value range	Remarks
Mic Auto Gain	MIC automatic gain is On or Off	Off, On	
RCA Input	Set the RCA input gain	0.0~10	dB
HDMI A Input	Set the HDMI A input gain	0.0~10	dB
HDMI B Input	Set the HDMI B input gain	0.0~10	dB
HDMI ARC Input	Set the ARC return input gain	0.0~10	dB
USB Input	Set the USB drive playback input gain	0.0~10	dB
Bluetooth Input	Set the Bluetooth input gain	0.0~10	dB
Default	Restore the factory default parameters	None	
Return	Return to the previous interface	None	

2.3.3 Setting Output PEQ Mode

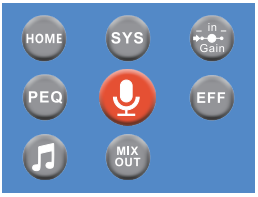
Menu operation interface

Short press the [MENU] knob

Setting Output PEQ Mode inferface

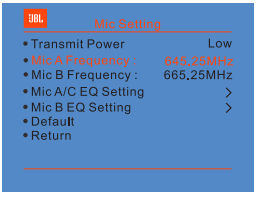
The integrated amplifier is preset with four modes: default (DFLT), speech (SPCH), music (MUSC) and performance (PERF), among which "DFLT" is the factory default preset mode. The English abbreviation of the selected preset mode will be displayed under the LOGO in the standby interface.

2.3.4 Mic Setting



Menu operation interface

Short press the [MENU] knob



Mic Setting parameters interface

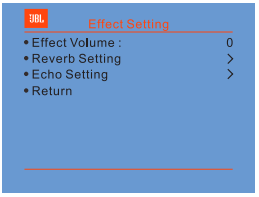
The list of Mic Setting parameters is as follows:

Parameters		Description	Value range	Remarks
Transmit Power		Adjusts the working distance of the wireless microphone (when the transmitting power is low, the working distance is short; when the transmitting power is high, the working distance is far)	High, Low	After setting the wireless microphone transmitting power, the frequency matching is required again to update its transmitting power.
MIC A frequency		Set MIC A carrier frequency	645.25 MHz~664.25 MHz	
MIC B frequency		Set MIC B carrier frequency	665.25 MHz~684.25 MHz	
MIC A/C EQ Setting	Low Cut	Set the lower cutoff frequency of microphone's frequency response	Off, 19.7~303 Hz	
	High Cut	Set the upper cutoff frequency of microphone's frequency response	Off, 5990 Hz~19800 Hz	
	EQ Bypass	When EQ bypass is Off, the equalization setting is valid; when EQ bypass is On, the equalization setting is invalid	Off, On	
	EQ	Equalization section, 7 sections in total	1~7	
	Frequency	Center frequency of this equalization section	19.7 Hz~20.2 kHz	
	Gain	Gain of this equalization section	-24.0~+12.0 dB	
	Q	Bandwidth of this equalization section	0.4~128	
	Default	Restore the factory default parameters	None	
	Return	Return to the previous interface	None	
MIC B EQ Setting	Low Cut	Set the lower cutoff frequency of microphone's frequency response	Off, 19.7~303 HZ	
	High Cut	Set the upper cutoff frequency of microphone's frequency response	Off, 5990 Hz~19800 Hz	
	EQ Bypass	When EQ bypass is Off, the equalization setting is valid; when EQ bypass is On, the equalization setting is invalid	Off, On	
	EQ	Equalization section, 7 sections in total	1~7	
	Frequency	Center frequency of this equalization section	19.7 Hz~20.2 kHz	
	Gain	Gain of this equalization section	-24.0~+12.0 dB	
	Q	Bandwidth of this equalization section	0.4~128	
	Default	Restore the factory default parameters	None	
	Return	Return to the previous interface	None	
Default		Restore the factory default parameters	None	
Return		Return to the previous interface	None	

2.3.5 Effect Setting

Menu operation interface

Short press the [MENU] knob



Effect Setting parameters interface

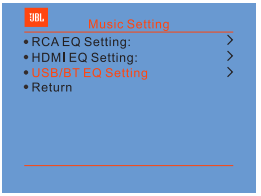
The list of Effect Setting parameters is as follows:

Parameters		Description	Value range	Remarks
Effect Volume		Set the effect sound volume (including reverb and echo)	0~100	Percentage
Reverb Setting	Reverb Volume	Set the reverb volume	0~200%	
	Reverb Direct Volume	Set the reverb direct volume	0~200%	
	Reverb PreDly	Set the reverb pre-delay time	0~80ms	
	Reverb Time	Set the reverb time	0~9200ms	
	Reverb LowCut	Set the reverb lower cutoff frequency	19.7~303Hz	
	Default	Restore the factory default parameters	None	
	Return	Return to the previous interface	None	
Echo Setting	Echo Volume	Set the echo volume	0~200%	
	Echo Direct Volume	Set the echo direct volume	0~200%	
	Echo PreDly	Set the echo pre-delay time	0~80ms	
	Echo Delay	Set the echo delay time	0~320ms	
	Echo Repeat	Set the number of echoes	1~90%	
	Echo HighCut	Set the echo upper cutoff frequency	5990Hz~20200Hz	
	Default	Restore the factory default parameters	None	
	Return	Return to the previous interface	None	
Return		Return to the previous interface	None	

2.3.6 Music Setting

Menu operation interface

Short press the [MENU] knob



Music Setting parameters interface

The list of Music Setting parameters is as follows:

Parameters		Description	Value range	Remarks
RCA EQ Setting	Low Cut	Set the lower cutoff frequency of the RCA input	Off, 19.7~303 Hz	Percentage
	EQ Bypass	When EQ bypass is Off, the equalization setting is valid; when EQ bypass is On, the equalization setting is invalid	Off, On	
	EQ	Equalization section, 7 sections in total	1~7	
	Frequency	Center frequency of this equalization section	19.7Hz~20.2 kHz	
	Gain	Gain of this equalization section	-24.0~+12.0 dB	
	Q	Bandwidth of this equalization section	0.4~128	
	Default	Restore the factory default parameters	None	
	Return	Return to the previous interface	None	
HDMI EQ Setting	Low Cut	Set the lower cutoff frequency of the HDMI input audio	Off, 19.7~303 Hz	
	EQ Bypass	When EQ bypass is Off, the equalization setting is valid; when EQ bypass is On, the equalization setting is invalid	Off, On	
	EQ	Equalization section, 7 sections in total	1~7	
	Frequency	Center frequency of this equalization section	19.7 Hz~20.2 kHz	
	Gain	Gain of this equalization section	-24.0~+12.0 dB	
	Q	Bandwidth of this equalization section	0.4~128	
	Default	Restore the factory default parameters	None	
	Return	Return to the previous interface	None	

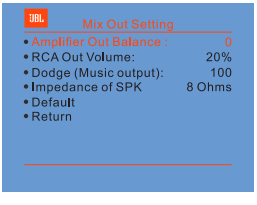
Continued:

Parameters		Description	Value range	Remarks
USB/BT EQ Setting	Low Cut	Set the lower cutoff frequency of the USB/Bluetooth input audio	Off, 19.7~303 Hz	Percentage
	EQ Bypass	When EQ bypass is Off, the equalization setting is valid; when EQ bypass is On, the equalization setting is invalid	Off, On	
	EQ	Equalization section, 7 sections in total	1~7	
	Frequency	Center frequency of this equalization section	19.7Hz~20.2 kHz	
	Gain	Gain of this equalization section	-24.0~+12.0 dB	
	Q	Bandwidth of this equalization section	0.4~128	
	Default	Restore the factory default parameters	None	
	Return	Return to the previous interface	None	
Return		Return to the previous interface	None	

2.3.7 Mix Out Setting

Menu operation interface

Short press the [MENU] knob



Mix Out Setting parameters interface

The list of Mix Out Setting parameters is as follows:

Parameters	Description	Value range	Remarks
Amplifier Out Balance	Set the left and right channel volume ratio of the total output	-100~+100	"-100" means that the left channel has the maximum volume and the right channel has zero volume. "+100" means that the left channel has zero volume and the right channel has the maximum volume.
RCA Out Volume	Set the RCA output volume	0~200%	
Dodge (Music output)	Volume of music output when the microphone is turned on	0~100	The output is a percentage of the current music volume.
Impedance of SPK	Rated impedance of external speaker	8 ohm (Ω) 4 ohm (Ω)	
Default	Restore the factory default parameters	None	
Return	Return to the previous interface	None	

2.4 Factory reset

Press the [MIC A/C] + [MIC B] knobs simultaneously and turn on the equipment (the system will automatically enter the factory reset, and then enter the standby interface after the reset).

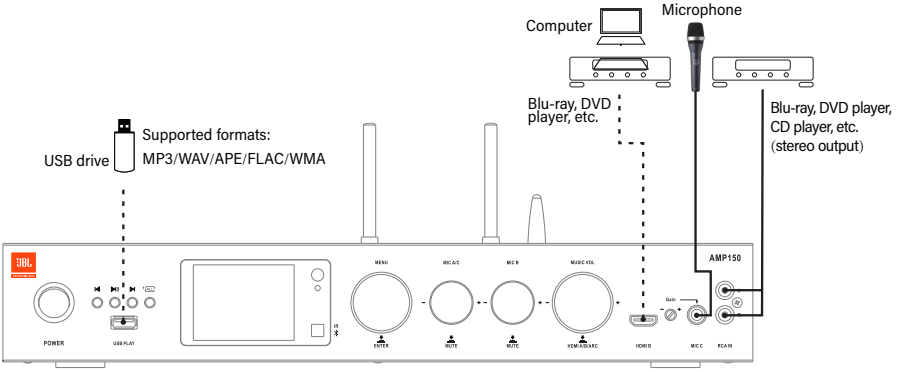
Chapter III System Connection

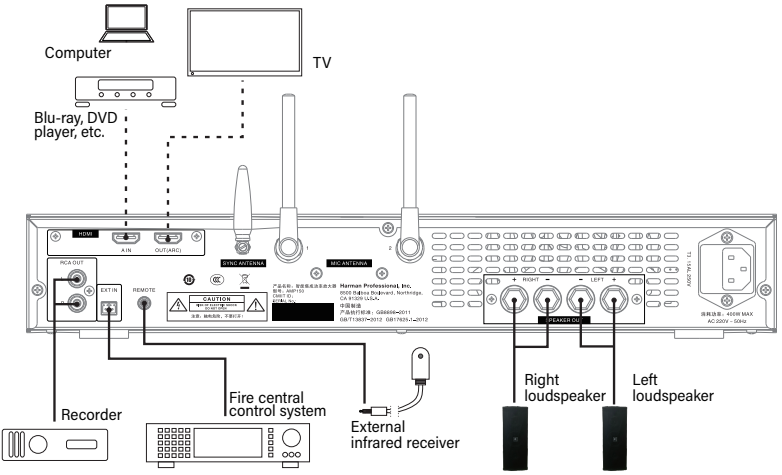
3.1 System connection

Please refer to the following "Connection Diagram of General Systems" for system connection.

Attention:

1. Make sure that all devices are powered off before connecting the system.
2. Please adjust the volume of all devices to the lowest level, and then turn on the power supply of this equipment.
3. In general, always turn the AMP on last during system startup and off first during system shutdown ("Last On / First Off").
4. In order to ensure proper HDMI playback, it is strongly recommended to use Version 2.0 HDMI cables.
5. When transmitting an audio signal from a terminal (such as a TV) to the AMP via HDMI ARC, set the audio signal output of the terminal to the PCM output.



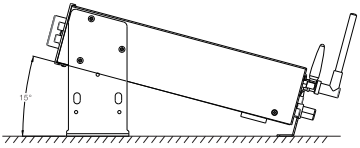


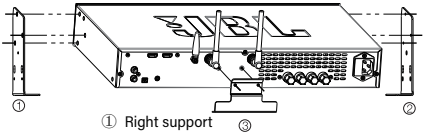
Analog connection ———

Digital connection - - - - -

3.2 Instructions for installation methods

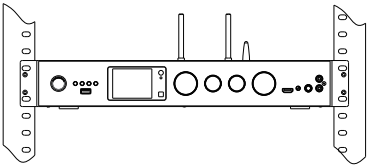
3.2.1 Table installation with an angle of 15°

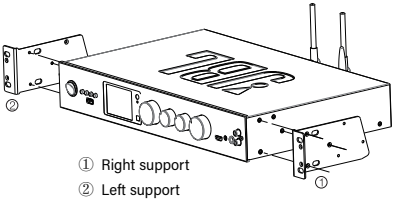




① Right support
② Left support
③ 15° rear support

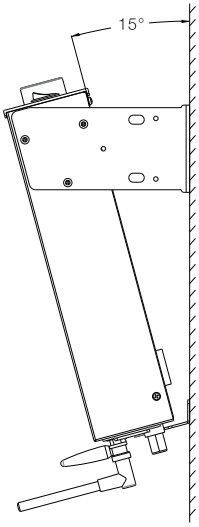
3.2.2 Cabinet installation

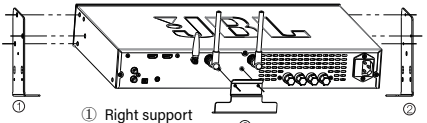




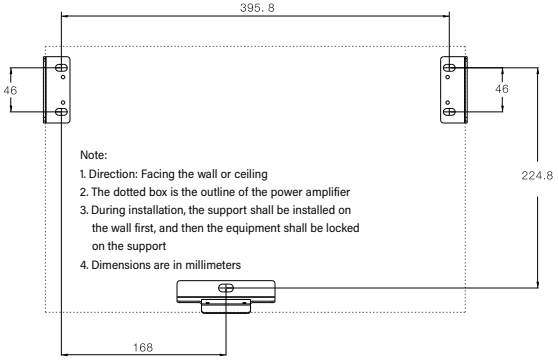
① Right support
② Left support

3.2.3 Wall installation with an angle of 15°





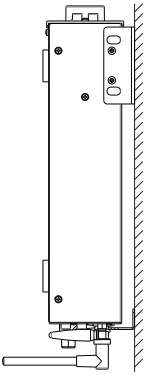
① Right support
② Left support
③ 15° rear support

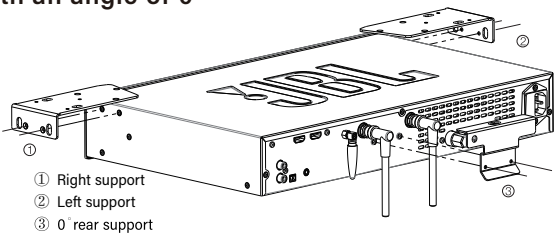


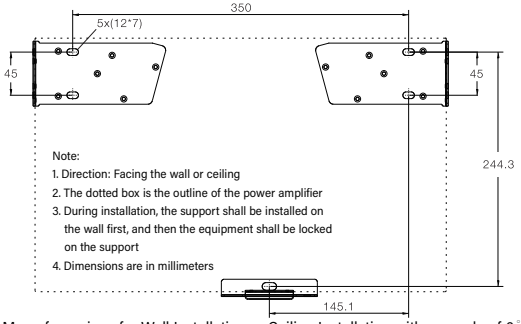
Note:
1. Direction: Facing the wall or ceiling
2. The dotted box is the outline of the power amplifier
3. During installation, the support shall be installed on the wall first, and then the equipment shall be locked on the support
4. Dimensions are in millimeters

Location Map of openings for Table Installation, Wall Installation or Ceiling Installation with an angle of 15°

3.2.4 Wall installation with an angle of 0°

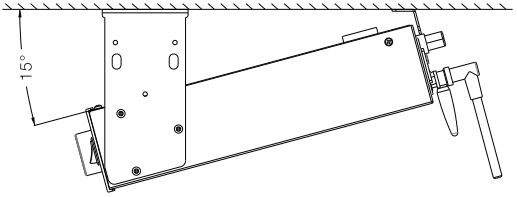






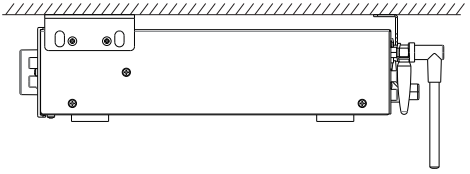
Location Map of openings for Wall Installation or Ceiling Installation with an angle of 0°

3.2.5 Ceiling installation with an angle of 15°



Note: The support installation and ceiling opening are the same as that in "Section 3.2.3 Wall Installation with an angle of 15°".

3.2.6 Ceiling installation with an angle of 0°



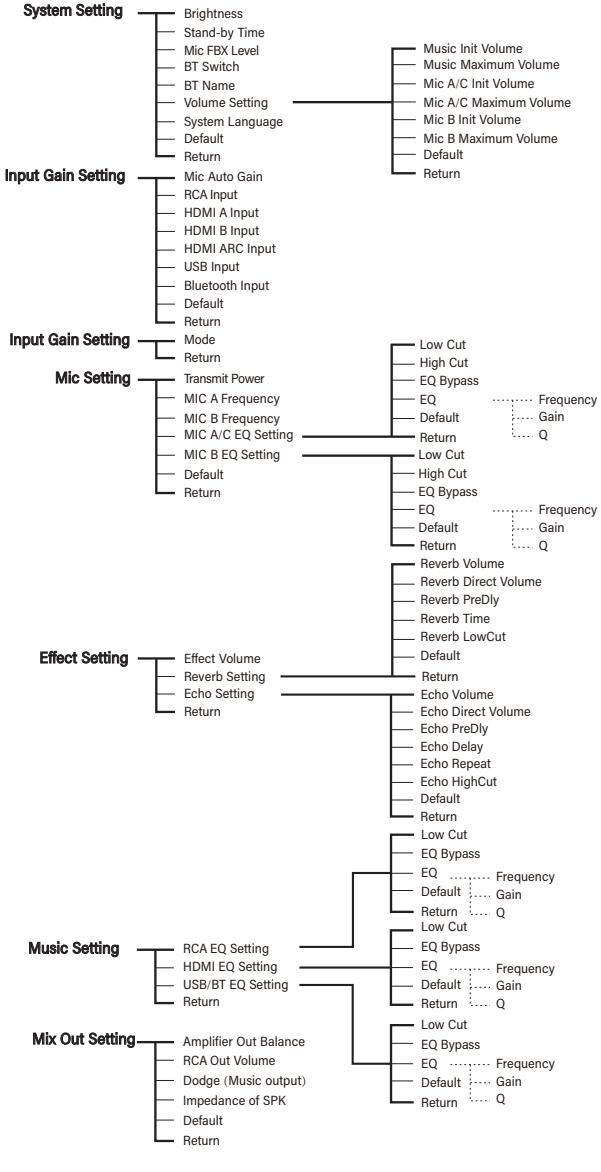
Note: The support installation is the same as that in "Section 3.2.4 Wall Installation with an angle of 0°".

Important notes:

1. To ensure stability, 10 x 50 expansion pipes and M6 x 50 screws are recommended for the wall or ceiling installation. Please make sure that the supporting force of the wall and ceiling can bear the weight of the device. HARMAN is not responsible for direct or indirect losses caused by improper installation.
2. During installation, the support shall be installed on the wall first, and then the equipment shall be locked on the support.
3. After installation, please adjust the receiving antenna and frequency matching antenna of the wireless microphone and keep them away from each other, so as to avoid mutual interference and influence on frequency matching.

Chapter IV Menu Structure

Menu structure:



Chapter V Instructions for Remote Controller

IRDA: Based on standard IRDA protocol

The function of remote control buttons is as follows:

① Standby button

Press the standby button and the AMP will enter standby mode, indicated by the standby state indicator illuminating yellow and the display screen turning off. Press the standby button again to exit standby mode, indicated by the standby state indicator turning off.

② Mode

Select between DFLT (default), SPCH (speech), MUSC (music) and PERF (performance) modes.

③ USB playback operation

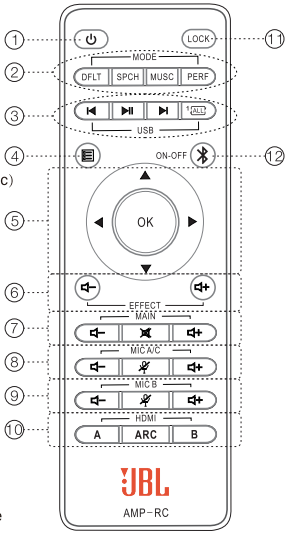
From left to right, these buttons correspond to previous, play/pause, next and cycle.

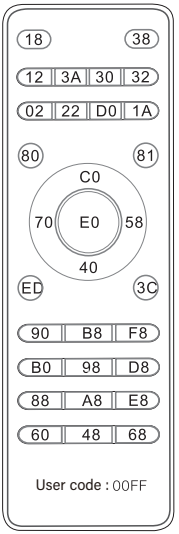
④ Menu settings

Press this button to enter the menu setting interface. Press it again to return to the standby interface. During menu editing, press it to return to the standby interface.

⑤ Menu item operation

The ▲ navigation button is used to select the menu item above. The ▼ navigation button selects the menu item below. The ◀ button is used to select the menu item to the left in the menu interface or reduce the parameter value when setting parameters. The ▶ button is used to select the menu item to the right in the menu interface or increase the parameter value when setting parameters.





Remote control code

Note: When naming Bluetooth, the up/down navigation buttons (▲/▼) are used to cancel/confirm a standard character, and the left/right navigation buttons (◀/▶) are used to select a character. Short press the OK button to end and exit the Bluetooth naming menu.

⑥ Effect volume setting

button decreases effect volume; button increases effect volume.

⑦ Music volume setting

button decreases music volume; button increases music volume; button mutes the output.

⑧ MIC A/C volume setting

button decreases microphone volume; button increases microphone volume; button mutes the microphone.

⑨ MIC B volume setting

button decreases microphone volume; button increases microphone volume; button mutes the microphone.

⑩ HDMI input switch setting

⑪ LOCK button

Press the LOCK button once to lock the AMP host; press the LOCK button again to unlock the AMP host.

⑫ Bluetooth On/Off

Short press this button to switch Bluetooth on or off.

Attention:

1. When the AMP panel button is locked with the remote controller (i.e., by pressing the LOCK button on the remote controller), the AMP panel must be unlocked with the remote controller (i.e., by pressing the LOCK button on the remote controller again) to make the AMP panel buttons work.

2. When the remote controller is used for standby (i.e., by pressing the standby button on the remote controller), the standby state can only be canceled by using the remote controller (i.e., by pressing the standby button on the remote controller again). When AMP is in standby mode, the power supply of the power output module and the backlight of the display screen will be turned off to reduce power consumption, and the standby indicator (yellow light) on the right side of the display screen will be turned on at the same time.

Chapter VI Specification Parameters

		AMP150	AMP350
Input interface			
USB/Bluetooth input x 1		Type B USB socket	
Stereo input (unbalanced) x 1 group		RCA socket	
HDMI input x 2		HDMI socket	
ARC audio input x 1		HDMI socket	
1/4 JACK input (balanced) x 1		TRS socket	
External infrared remote controlled interface x 1		3.5 mm socket	
EXT In input (short circuit trigger) x 1		2-PIN phoenix socket	
Output interface			
HDMI output x 1		HDMI socket	
Stereo mixed output x 1 group		RCA socket	
Speaker terminal output (stereo) x 1 group		Terminal	
Technical Specifications			
SNR	RCA input, 8 ohm (Ω) load, A-weighted	≥85 dB	
	1/4 TRS input, 8 ohm (Ω) load	≥75 dB	
Frequency response	RCA input, 8 ohm (Ω) load, 1W, 20 Hz – 20 kHz	-1dB~+1dB	
	1/4 TRS input, 8 ohm (Ω) load, 1W, 50 Hz – 14 kHz	-3dB~+1dB	
THD+N	RCA input, 8 ohm (Ω) load, 1 kHz, rated power output, 20 Hz – 20 kHz bandwidth	≤1%	
	1/4 TRS input, 8 ohm (Ω) load, 1 kHz, rated power output, 20 Hz – 20 kHz bandwidth	≤1%	
Input impedance	RCA input, f=1 kHz	10K ohms	
	1/4 TRS input, f=1 kHz	3.6K ohms	
Rated power	THD+N ≤ 1%, 8 ohm (Ω) load, 20 Hz – 20 kHz bandwidth	150 watts	350 watts
USB	Audio format	MP3,WAV,APE,FLAC,WMA	
	File system	FAT16,FAT32,ExFAT/Fat64	
	Maximum capacity	32G	
Bluetooth	Version	V4.2/2.1+EDR	
HDMI	Version	1.4/2.0	
	Supported format	Up to 4K/60 Hz (8 bit) and 4K/30 Hz (16 bit)	
Power requirements		AC 220V~50Hz	
Size		Width 428.4 * depth 266.5 * height 67.7 mm (depth excluding antenna and knob)	
Net weight		4.4Kg	5.0Kg
Gross weight		6.3Kg	6.9Kg

JBL AMP SERIES

Intelligent Integrated Amplifier

User Manual

Issued:07/2020