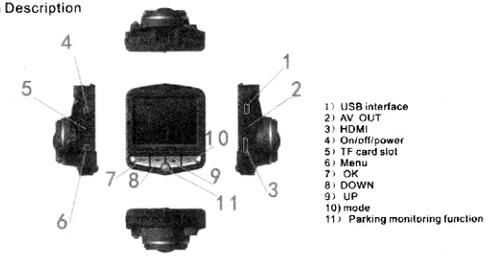
driving recorder
Instructions for use

This car DVR newly increased 4 functions except for the basic function:
（1）HD 1080P 30fps MOV High Image Quality HD IR Resolution HDMI HD out
（2）Shortcut lock or unlock the recording video document
（3）Parking monitoring function: after start the parking monitoring function, the machine can start to record and save the document automatically according to the environment.
（4）Build-in G-Sensor, can record the gravity sensing information and determine on the basis of the car's up and down, left and right, front and rear offset, when reaches a certain value will regards as the abnormal of driving then the DVR will lock the current video to protect it.
In order to better play to the maximum efficiency of the car DVR, please read this manual carefully before use (if any change for the design of the machine, accessories and specifications will not prior notice).

Function Description



1）USB interface
2）AV OUT
3）HDMI
4）On/off/power
5）TF card slot
6）Menu
7）OK
8）DOWN
9）UP
10）mode
11）Parking monitoring function

1、Power:
Function one：Turn on/turn off
Under the power off model, short press the power button about to turn on the machine and enter standby model. Under the power on state, long press the power button the machine will save the recording document or the setting information automatically then turn off.
Function two：Camera fill light
Under the standby,recording or taking photo model, short press the power button can turn on/turn off/ the ir light
2、Confirm button:
Function one：Under the standby model, short press the OK button to begin recording, short press the OK button can stop recording when recording.
Function two: under the taking photo model, short press the OK button to take photo.
Function three: under the playback model, short press the OK button can start or suspend the video.
Function four: confirm and save the operation under the recording menu, setting menu, photo taking menu, playback menu.
3、Menu:
Function one: menu function: Under the standby model, short press the menu button once enter to the recording menu, press twice enter to the setting menu. if press the menu button under this menu the machine will exit and back to the standby state.
Under the photo taking model, short press the menu button once enter to the photo taking menu, press twice enter to the setting menu.
Under the playback model, short press the menu button once enter to the document menu, press twice enter to the setting menu.
4、Mode:
function one: enter the photo taking model
Under the standby model, short press the mode button once enter the photo taking model.
Function two: enter the playback model
Under the standby model, short press the mode button twice enter the playback model, press the mode button again to exit and back to the standby state.
Function three: save and protect the document function
When recording, short press the mode button can lock or unlock the recording document.
5、Up button:
Function one: under any menu, press the up button can choose the previous option
Function two: under the recording and photo taking model, press the up button can enlarge zoom
Function three: when playback the video, press the up button can turn up the volume
Function four: under the playback model, press the up button enter the scratchable latex picture
6、Down button:
Function one: under any menu, press the down button can choose the next option
Function two: under the recording and photo taking mode, press the down button can lessen zoom
Function three: when playback the video, press the down button can turn down the volume
Function four: under the recording or standby model, press the down button can start or close the audio
7、Parking monitoring function:
1.Before turn off the machine, press the park button, the P icon appear on the right side of the screen. the machine will enter the parking monitoring model. If turn off the machine under the parking monitoring model. when something hit the camera or the car, the car dvr will turn on and recording about one minute and save the document automatically then turn off.
2. after you start the parking monitoring mode. If you want to cancel this function, please press the part button once, the P icon on the top left corner will disappear. It means the car will not operate the parking monitoring function.
Charging
Two methods:
1、Connect the DVR to the computer with USB cable.
2、Connect to the car charger.
When being charged, the LCD screen will appear the charging icon, and stop flashing when fully charged.
It need about 120 minutes.
Prepare the storage (TF) card
Note: this machine need the high speed TF card (above class 6)
Insert and extract the TF card
1. Put the TF card into the TF card slot in right direction till it is fixed to the slot.
2. When extract the TF card, please press the TF card gently then take it out after popping.
Note:
1. please don't extract the TF card when it works to avoid damage.
2. Please pay attention to the direction when put the card, the machine or the TF card will be damaged if plug in opposite direction.
3.when you plug the TF card, the machine will set it as The default storage devices, the information in primary TF card will not be read
4. If the TF card is not compatible, please try it again or change another TF card.
5. Maximum support 32GB
Adjust the lens
Thought the holder, this machine can rotate 360 degree,it will be better for cooperating with the permanent position of the car dvr and get the better taken effect.
Turn on/turn off the machine
1.Turn on/turn off the machine by manual：short press the power button once, the screen bright, long press the power button to turn off.
2、Turn on/turn off the machine by automatic: connect to the 5V power first, the machine will turn on and begin to record when start the engine of the car. When shut off the engine, the machine will save the video according to the menu then turn off automatically after 10 seconds.
Note: when use the build-in power, the machine will prompt low power and save the document then turn off automatically if the power is not enough.
Basic operation
Switch the working mode
This machine supply three work models: recording, photo taking and playback. Press the mode button can switch them.
Setting the menu and system
Under the recording and photo taking model, continuously press the menu button twice enter the system setting option, this time the field of the menu setting is blue. Press up/down button to choose the option. Press "REC" button to confirm. Press the menu button again to exit menu.
System setting
Date and time：
Turn off automatically: 3/5/10 minutes
Keypad tone: on/off
Language:
English/Portuguese/Russian/simplified/traditional/Chinese/Japanese/French/Spanish/German/Italian
TV system：P/N
Light source frequency：50/60
IR light: On/off
Power saving mode: close 3/5/10 minutes(Screen Off automatically)
format：Memory card
Default setting:Yes/No
Firmware Version：version number branch test

Shoot

The camera enter the shooting mode, on the top left corner will appear the icon, press OK button to start shooting, the icon will appear on the top left corner this time. Press the recording /photo taking button again to stop shooting. The icon on the top left corner will disappear.

Recording mode
Photo reputation：Full HD 1080P 30fps；HD 720P 60fps；WVGA、640*480P
Cycle recording：close 2/3/5 minutes
HDR：on/off
Camera fill light：EV-2.0、EV-5/3、EV-4/3、EV-1.0、EV-2/3、EV-1/3、EV+0.0、EV+1/3、EV+2/3、EV+1.0、EV+4/3、EV+5/3、EV+2.0
Motion detection：on/off
Recording Audio：on/off
Date and time label：on/off
Accelerometer setting：off, low, middle, high
Photo taking setting
1. press the power button, the machine enter to the recording mode, press the mode button enter to photo taking mode, the top left corner of the screen will appear icon, it enter the photo taking mode.
2 when press the photo taking button, make a sound of click then appear picture preview. About one second later, the photo is taken. Please hold the camera and don't shake to avoid effect the quality of the photo.
Photo taking method：single shot, two second timing, five seconds timing, ten seconds timing.
Resolution：12M、10M、8M、5M、3M、2M、VGA、1.3M
Burst shooting：on/off
Photo quality：high quality, standard, economic
Acutance：strong, standard, gentle
White balance：automatic,Sunlight, cloudy, tungsten filament lamp, fluorescent lamp
Colour：colour,black and white,sepia
ISO：automatic、100、200、400
Camera fill light：EV-2.0、EV-5/3、EV-4/3、EV-1.0、EV-2/3、EV-1/3、EV+0.0、EV+1/3、EV+2/3、EV+1.0、EV+4/3、EV+5/3、EV+2.0
Anti-shake：on/off
Instant Previews：close, 2 seconds, 5 seconds
Date and time label：close, date, date/time
Playback mode
1. Browse Files:
When the camera finish the turn on procedure and enter the recording mode, press the mode button button twice, enter the playback mode, press the up/down to choose the document, it playback according to the file type, when the file is video it only can browse the video document, if the file is picture, it only can browse the picture document.
2. Delete or protect the file
Under the playback mod, press the menu button will appear the delete or protect option, press OK button enter the "delete the current" "delete all" press OK button again to confirm it. You also can lock the document, it cant be deleted before unlock. Can protect some important document.
Using the shortcut during recording
Press the mode button：press the mode button to lock or unlock the document under the emergency circumstances.
Menu button：When recording, press the menu button to start/ close the scree fill light
Short press the button：fast switch fill light
Press the down button to close the microphone：under the recording mode, press the down button can fast close the microphone.
Recording while charging
Connect the camera to car charger via the USB cable. Turn on the machine can recording while charging.
Read the video and USB function
This machine support USB directly read, when you need to browse the recording file, you can connect it to the computer via USB cable directly, or take out the TF card, using the card reader to read the file.
PCCAM
This machine can work as a PCCAM, connect the machine to computer via USB cable; popping the MSDC/PCCAM/POWER option, press the up/down button to choose the PCCAM and press the recording button to confirm, open my computer, it will appear the icon, double-click the icon can use as PCCAM.

Connect to TV to playback
1. connect to the TV via the AV cable can playback the file.
Prompting: there is no need to install driver
product feature-Large screen can more clearly see the video effect,1080P ultra wide Angle lens perfect combination design, more convenient to shooting thought multi-angle and high resolution recording under various occasions.
-Build-in 1/3 Low noise degree high quality sensor, can capture the ultra clear pictures in dark places .
-Build-in lithium battery, can recording while charging
-Build-in microphone/loudspeaker
-Support high Micro TF card
-Start recording automatically when start the car
-Having the delay start function, Prevent damage the machine for car instantaneous pulse current
-G-SENSOR

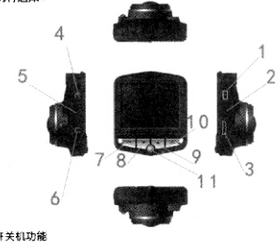
Technical parameters

screen	hd display
Pixel	12000000
Angle	170 degrees
lens	6G glass A+High level analytical multilayer filter wide Angle lens AR0330 or 9712
Video resolution	1920x1080P(30fps)/1280*720P(60fps)/848*480/640*480(30fps)
Recording method	Cycle recording/Motion detection
Seamless video	Yes
Recording automatically	Yes
Video segmentation time	2/3/5 Minutes（choose）
	4482592x1944/2048x1536/1920x1080/1280x960/640x480
Picture format	JPEG
Video out	AVO UT HDMI OUT
G-sensor	Urgently lock the document and not be deleted when crash
Manual lock	Short press the lock button when recording, lock the current file not to be deleted
IR function	Strong LED light
transmission speed	USB2.0
Memory card	TF card
storage	Max support 32GB
USB	Mini 5Pin USB2.0
Build-in loudspeaker	8R 1W
Build-in audio record	High real loudspeaker, can turn on/off the audio record
Battery	Build-in lithium battery
consumption	Standby 200 MAH recording 250MAH-315MAH
Car DVR power	5V 1.5A
	Windows 2000/XP/Vista/Windows 7,MAC OS x 10.3.6 above
Storage keeping temperature	-10℃~70℃
Working temperature	-10℃~60℃

高清行车记录仪

使用说明

本机除了具备行车记录仪的通用功能外，新增了四大主要特点：
（1）高清1080P 30fps MOV 高画质 高清夜视晰度 HDMI高清输出
（2）快速锁定录影文件或解锁文件功能
（3）停车监控功能：开启停车模式功能后，在关机的状态下也能自行对周围环境进行判定自动开机录像并且自动保存保护文件。
（4）内置重力感应器G Sensor，能记录下重力感应信息并且依据车子的上下、左右、前后的偏移量进行判定，当达到一定值时就认为行车出现异常并自动对当前的录影进行加锁保护。
为了更好的发挥行车记录仪的最大效能，请您在使用之前仔细阅读此手册（本机和附件的设计和规格
如有变更，恕不另行通知）



1）USB接口
2）AV 接口
3）HDMI接口
4）电源键
5）TF卡槽
6）菜单键
7）OK键
8）下键
9）上键
10）模式键
11）停车功能键

1．电源键：
功能一：开关机功能
在关机的状态，通过短按[电源键]可以进行开机进入待机工作状态。在开机的状态下通过长按[电源键]可以使机子自动保存录像文件或设置好的各项数据后执行关机动作。
功能二：摄像头补光灯功能
在待机、录像、拍照模式下短按[电源键]可以开启/关闭红外灯。
2．确认键：
功能一：开启/关闭录像功能。
在待机模式下，短按[确认键]开启录像，正在录像时短按[确认键]停止录像。
功能二：拍照功能
在拍照模式下短按[确认键]执行拍照。
功能三：文件播放功能
在回放模式下短按[确认键]可以执行播放/暂停视频文件。
功能四：确认功能
在录像菜单、设置菜单、拍照菜单、回放菜单下对所进行设置操作的选项进行确认保存执行动作。
3．菜单键：
功能一：菜单功能
在待机状态下，短按[菜单键]一次进入录像菜单，连按两次进入设置菜单，在本设置菜单模式下如果再按[菜单键]会自动退出到待机状态。
在拍照模式下，短按[菜单键]一次进入拍照菜单，连按两次进入设置菜单。
在回放状态下，短按[菜单键]一次进入文件夹菜单，连按两次进入设置菜单。
4．模式键：
功能一：进入拍照状态
在待机状态下，短按一次模式键进入拍照状态。
功能二：进入回放状态
在待机状态下，连按两次[模式键]进入回放状态，再按[模式键]自动回退到待机状态。
功能三：保护文件功能
正在录像时，短按[模式键]可以对当前正在录像的文件片段进行加锁保护或解锁。
5．上键：
功能一：在各菜单里按[上键]进行上选功能。
功能二：在录像和拍照状态了进行放大变焦功能。
功能三：正在播放视频时，对所播放的视频文件进行音量的加大
功能四：在回放状态下，按上键进入九宫格画面。
6．下键：
功能一：在各菜单里按[下键]进行下选功能。
功能二：在录像和拍照状态了进行缩小变焦功能。
功能三：正在播放视频时，对所播放的视频文件进行音量的减小。
功能四：在录像状态或待机状态下，按下键进行开启/关闭音频。
7．停车模式键：
功能一：在关机前如果按停车模式键一下，这时机子的屏幕右边沿就会有P字母显示出来，这时机子就会进入停车模式。在停车模式下关机后，如果有外来物震到机子或车子，这时机子会自动开机进行录像一分钟左右并且对文件执行自动保护再关机。
开启停车模式后如果想取消该功能，再按停车模式键一下，这时屏幕的左上角P字母消失，这代表机子将不会在执行停车模式功能。

为电池充电
有二种方法可以给电池充电：
1．使用USB线将本机连接到电脑充电；
2．使用随机附带的车载电源充电。
充电过程中LCD屏幕会显示充电图标，充电完成后，图标指示不闪烁。
整个充电时间大约需要120分钟。
存储卡（TF）准备
TF卡要求：本机要求TF卡容量需要速度在CLASS6以上。
安装与拔除TF卡
1，按照正确方向将TF卡插入TF卡槽，直至TF卡被固定在卡槽为止。
2，取出TF卡时，请轻轻压下TF卡，待TF卡弹出后即可取出。
注意：
1，注意：请不要在机器工作的时候拔插TF卡，以免损坏。
2，请注意TF卡插入的方向，若倒转插入，可能会损坏机器与TF卡
3，当您将TF卡插入机器后，机器即会将此TF卡设定为预设存储设备，原TF卡内的资料可能无法读取
4，如果TF卡与机器不相容，请重新再插一次或再换张TF卡重试。
5，支持最高32G。
调整镜头的位置
本机前镜头通过交叉可前后360度旋转，以便更好地配合行车记录仪的固定位置，获得较好的拍摄效果。
打开和关闭本机
1 手动开关机：短按电源按钮一次，屏幕亮起，再长按电源按钮可实现关机。
2．行车自动开关机：先接入车载5V电源，在汽车启动时经过延时后机子会自动启动并进行录影。当汽车停火息火后根据菜单选择的延时自动保存当前录影并关机默认为10秒。
注意：行车记录仪在使用内置电源时，在低电量时会提示低电存录影自动关机。
行车记录仪的基本操作
切换工作模式
本机有三种工作模式：摄像、拍照和片段回放和拍照浏览。按MODE键可以切换。
设置菜单和系统设定
在摄像或者照相模式下，连续按（MENU）菜单键两下，进入“系统设定”选项，此时“菜单设定”的栏位是蓝色背景。按上/下键选择所需设置项目；按“REC”键确认设置，再次按菜单键可退出菜单。
系统设置选项
时间日期：
自动关机：关/3/5/10分钟
按键音：开/关
语言选择：英语/葡萄牙语/俄语/中文简体/繁体/日本语/西班牙语/法语/德语/意大利语
TV制式：P/N
光源频率：50/60
夜光灯，开/关
省电模式：关/3/5/10分钟(自动关屏)
格式化：记忆卡
默认设置:是/否
固件版本：版本号 分枝 测试

摄影
摄像机进入到摄像模式，屏幕的左上角有 标志闪动，按OK键开始录影，录影时屏幕的左上角 标志闪动，再按录影拍照键停止录影，同时左上角的 消失

录影模式选项
图像参数：全高清1080P 30fps；高清720P 60fps；WVGA，640*480P
循环录影：关，2分钟，3分钟，5分钟；
HDR：开/关，
曝光补偿：**EV-2.0，EV-5/3，EV-4/3，EV-1.0，EV-2/3，EV-1/3，EV+0.0，EV+1/3，EV+2/3，EV+1.0；EV+4/3，EV+5/3，EV+2.0**
运动检测：开/关；
录影音频：开/关
日期标签：开/关
加速度感应设置：关，低，中，高，

拍照模式及拍照模式设置
1．按下开关机键，摄像机进入摄像模式，按下模式键进入拍照模式，屏幕的左上角有 符号时，此时进入拍照模式。
2．按下录影拍照键时，伴随一声，出现图片拍览等待，大约1秒后，拍照完成，拍照时抓稳摄像机尽量不要抖动，以免影响图片质量。
连拍方式：单拍，2秒定时，5秒定时，10秒定时，
分辨率：**12M，10M，8M，5M，3M，2M，VGA，1.3M**
连拍：开/关
图像质量：优质，标准，经济
锐度：强烈，标准，柔和
白平衡：自动，日光，阴天，钨丝灯，荧光灯
色彩：色彩，黑白，棕褐色
ISO：自动，100，200，400
曝光补偿：**EV-2.0，EV-5/3，EV-4/3，EV-1.0，EV-2/3，EV-1/3，EV+0.0，EV+1/3，EV+2/3，EV+1.0 EV+4/3，EV+5/3，EV+2.0**
防手震：开/关
快速预览：关，2秒，5秒
日期标签：关，日期，日期/时间

回放模式
1．浏览文件：
当摄像机完成开机程序并进入摄像模式，此时按模式键2次，进入回放模式，按上键或下键可对图片影音资料进行浏览。回放时是按文件类型分别浏览，当文件类型为录像时，只能浏览录像文件，为图片时，只能浏览图片。
2，删除与保护
在回放模式下，按菜单键出现删除和保护加锁选项，按OK键进入“删除当前”“全部删除”选项，在按OK键进入，在按OK键确定。也可以对文件进入加锁，解锁前就不能删除，保护一些重要资料。

录影过程中快捷键应用：
按模式键：紧急情况下手动锁[模式键]对当前的视频文件进行加解锁。
菜单键：正在录像时短按[菜单键]进行开启/关闭屏幕背光。
短按 电源键：快速切换补光灯
按下键关闭麦克风：在录像状态，按下键能快速关闭麦克风

边充电边录影模式
用车充连接到机器的**USB**端，开机即可以进入边充电边录影的模式

录影读取及USB功能说明。
本机支持USB直接读取，读取本机所录制录影文件时可也直接将本机与电脑用USB线连接，或者直接取出TF卡，用读卡器读取TF卡中的文件。

PCCAM电脑摄像头
本机可以做为电脑摄像头使用，用**USB**线将摄像机与电脑连接，出弹出**MSDC/PCCAM/POWER**选择，按上下键移动选择到**PCCAM**后按录像键确认后，打开我的电脑，里面就会有 双击这个图标就可以当电脑摄像头使用了。

连接电视机播放
1，用TV连接线可以直接高品质电视进行回放
提示：无需安装驱动程序。
产品特性 超大屏幕可以更清楚的看到预录效果。1080P超广角视觉镜头完美组合设计，更方便于各种场合进行多角度，高解析的视频拍摄
-内置1/3寸低噪度高画质感光元件，可在较暗的场合捕捉超清晰的画面
-内置锂电边充电边录影功能
-内置麦克风/喇叭
-支持高容量Micro TF卡
汽车发动自动开机录影功能
-具延迟启动功能，防止汽车发动瞬间脉冲电流损坏机器
重力感应G SENSOR

技术参数

显示屏	高清显示屏
像素	1200万
角度	170度
镜头	6G玻璃 A+级高解析多层镀光广角镜头
录像分辨率	1920x1080P(30帧)/1280*720P(60帧)/848*480/640*480(30帧)
录像方式	循环录像/移动检测
无缝录像	是
开机自动录像	是
视频分段时间	2分钟/3分钟/5分钟（可选）
拍照分辨率	4032x3024/3648x2736/3264x2448/2592x1944/2048x1536/1920x1080/ 1280x960/640x480
图像格式	JPEG
视频输出	AVOUT输出 HDMI高清输出
重力感应	汽车发生碰撞时，紧急保存，不被删除
手动锁定	录像时，短按锁定键，锁定当前文件不被删除
夜视功能	强光LED灯
传输速度	USB2.0
记忆卡	TF储存卡
容量支援	最大32GB
USB接口	Mini 5Pin USB2.0
内建喇叭	8R 1W
内置录音	高保真喇叭，录音可选关闭或打开
电池	内置锂离合箱
功耗	待机200 MAH 录像 250MAH-315MAH
车载电源DC输入	5V 1.5A
系统要求	Windows 2000/XP/Vista/Windows 7,MAC OS x 10.3.6以上
存储温度	10℃~70℃
操作温度	-10℃~60℃