1. General Description

This Document contains the log data of a read out logfile. It shows what happened with the specified vbar unit during the latest time

Version of PC Software	**5.3.4 29.10.2012**
Date	**Sun Oct 11 19:30:05 EEST 2015**
Serial	**1410043376**
Prod Date	**21.7.2014 10:23**
Firmware	**5.3**
Patchlevel	**4**

2. Chronological List of Events

✖	0:00	Extreme Vibration Level	Vibrations are extreme. That means, that the measurement signal is much lower than the signal level of the vibrations. No usable flying is possible with this level. Everything has to be checked and extended tests are needed to isolate and eliminate the source of vibrations
▷	0:01	Governor Mode Throttle	Governor off, the servo moves with the throttle input channel
✖	0:10	Extreme Vibration Level	Vibrations are extreme. That means, that the measurement signal is much lower than the signal level of the vibrations. No usable flying is possible with this level. Everything has to be checked and extended tests are needed to isolate and eliminate the source of vibrations
✔	0:20	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	0:30	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	0:40	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	0:50	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	1:00	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	1:10	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	1:20	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	1:30	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	1:40	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	1:50	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	2:00	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	2:10	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	2:20	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	2:30	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	0:00	Coldstart	A Coldstart is done on the beginning of each switch on time. A Coldstart can happen only, if the VBar Units is disconnected from power for more than 5 Seconds.
✔	0:00	Reset Reason: Power On	This happens if power is applied to the VBar unit. Usually this is ok, but it shall never happen in operational mode. So if a reset happens during flight, this points to a power problem. During flight the power on reset results in a warmstart. If a coldstart happens during flight, the power loss was more than 5 Seconds
▷	0:00	Bank 0 Loaded	Bank 0 was loaded from the non volatile memory. This can be triggered my manual backswitch from the userinterface as well as in flight if bank switch is programmed to the aux channel. On Startup the Bank 0 is loaded by default.
▷	0:00	Governor Mode Throttle	Governor off, the servo moves with the throttle input channel
✔	0:00	Coldstart	A Coldstart is done on the beginning of each switch on time. A Coldstart can happen only, if the VBar Units is disconnected from power for more than 5 Seconds.
✔	0:00	Reset Reason: Power On	This happens if power is applied to the VBar unit. Usually this is ok, but it shall never happen in operational mode. So if a reset happens during flight, this points to a power problem. During flight the power on reset results in a warmstart. If a coldstart happens during flight, the power loss was more than 5 Seconds
▷	0:00	Bank 0 Loaded	Bank 0 was loaded from the non volatile memory. This can be triggered my manual backswitch from the userinterface as well as in flight if bank switch is programmed to the aux channel. On Startup the Bank 0 is loaded by default.
▷	0:00	Governor Mode Throttle	Governor off, the servo moves with the throttle input channel
✖	0:00	Warmstart	Warmstart is an indication for a short power loss, or any other reset reason. If the CPU comes up, and detects, that the power loss was less than 5 seconds, this causes a warmstart. This can happen also, if power is applyed and removed in a short sequence. When bining a Spektrum Sattelite, this will occur and is intended.

✔	0:00	Reset Reason: Power On	This happens if power is applied to the VBar unit. Usually this is ok, but it shall never happen in operational mode. So if a reset happens during flight, this points to a power problem. During flight the power on reset results in a warmstart. If a coldstart happens during flight, the power loss was more than 5 Seconds
▷	0:00	Bank 0 Loaded	Bank 0 was loaded from the non volatile memory. This can be triggered my manual backswitch from the userinterface as well as in flight if bank switch is programmed to the aux channel. On Startup the Bank 0 is loaded by default.
✖	0:00	Sensor Connection broken	Data is transmitted in very short sequence from the sensor. The packets arrive multiple times each frame. This Error is issued, if in a time of 50ms no Data packets did arrive. This is probably a total lost of the sensor connection. In this case, the VBar goes into emergency mode, where control is still possible, but there is no more additional stability from the sensors. The Throw is halfed, to calm down the control a bit and make a landing possible.
⚠	0:00	Sensor Data Checksum Error	Each Data packed from the sensor carries a checksum. If this checksum does not match with the calculated checksum, this error is thrown. Since packets are repeated very fast, this is not a complete control lost. The sensor data is going to hold until a valid checkum is calculated. This error pints to some wiring problems of the sensor. It also may occur if static discharges hit the sensor or the connection to the sensor.
✖	0:00	RC Input of Pitch Channel missed	The Pitch Input Signal ist updated with each Frame recived from the reciver. This Error is raised, if for 50ms no new signal arrives from the reciver. Depending on the hardware connection this can point to a problem with the connection to the reciver/sattelite. In case of sattelite recivers used, all channels will be accused at the same time. In case of single channels, this can happen seperately on each channel. Closely check your wiring for broken wires or connection problems
✖	0:00	RC Input of Aileron Channel missed	The Aileron Input Signal ist updated with each Frame recived from the reciver. This Error is raised, if for 50ms no new signal arrives from the reciver. Depending on the hardware connection this can point to a problem with the connection to the reciver/sattelite. In case of sattelite recivers used, all channels will be accused at the same time. In case of single channels, this can happen seperately on each channel. Closely check your wiring for broken wires or connection problems
✖	0:00	RC Input of Elevator Channel missed	The Elevator Input Signal ist updated with each Frame recived from the reciver. This Error is raised, if for 50ms no new signal arrives from the reciver. Depending on the hardware connection this can point to a problem with the connection to the reciver/sattelite. In case of sattelite recivers used, all channels will be accused at the same time. In case of single channels, this can happen seperately on each channel. Closely check your wiring for broken wires or connection problems
✖	0:00	RC Input of Tail Channel missed	The Tail Input Signal ist updated with each Frame recived from the reciver. This Error is raised, if for 50ms no new signal arrives from the reciver. Depending on the hardware connection this can point to a problem with the connection to the reciver/sattelite. In case of sattelite recivers used, all channels will be accused at the same time. In case of single channels, this can happen seperately on each channel. Closely check your wiring for broken wires or connection problems
✖	0:00	RC Input of AUX Channel missed	The AUX Input Signal ist updated with each Frame recived from the reciver. This Error is raised, if for 50ms no new signal arrives from the reciver. Depending on the hardware connection this can point to a problem with the connection to the reciver/sattelite. In case of sattelite recivers used, all channels will be accused at the same time. In case of single channels, this can happen seperately on each channel. Closely check your wiring for broken wires or connection problems. The aux channel is monitored only in case it is used by the bank selekt switch
✖	0:00	DANGER!!! Supply Voltage dropped below 3.5V	The Voltage dropped below the given Threshold. This check shows even small drops in the supply voltage. Usually at this Voltage the 2.4Ghz Gear drops out and takes some time for reconnect. Immediately stop operating this heli and do a ground up check of the power supply
▷	0:00	Governor Mode Throttle	Governor off, the servo moves with the throttle input channel
✔	0:00	Coldstart	A Coldstart is done on the beginning of each switch on time. A Coldstart can happen only, if the VBar Units is disconnected from power for more than 5 Seconds.
✔	0:00	Reset Reason: Power On	This happens if power is applied to the VBar unit. Usually this is ok, but it shall never happen in operational mode. So if a reset happens during flight, this points to a power problem. During flight the power on reset results in a warmstart. If a coldstart happens during flight, the power loss was more than 5 Seconds
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▷	0:00	Governor Mode Throttle	Governor off, the servo moves with the throttle input channel
▷	0:06	Calibration Finished	At each Coldstart, the sensor and RC Values are calibrated to the actual seen values. If the calibration is finished, this message confirms the storage of data into the internal non volatile calibration memory
✔	0:16	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	0:26	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.

✔	0:36	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	0:46	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	0:56	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	1:06	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
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✔	1:46	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
✔	1:56	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
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▷	0:00	Governor Mode Throttle	Governor off, the servo moves with the throttle input channel
⚠	0:01	Init Failed, retrying...	The Init process of the sensors is very sensitive to movements of the heli or from other external disturbances, i.e. Voltage jumps and glitches. This can lead to a failed initialization. In this Case it is repeated. If this repeats itself all the time, this can point to a defective sensors.
✖	0:00	Warmstart	Warmstart is an indication for a short power loss, or any other reset reason. If the CPU comes up, and detects, that the power loss was less than 5 seconds, this causes a warmstart. This can happen also, if power is applyed and removed in a short sequence. When bining a Spektrum Sattelite, this will occur and is intended.
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▷	0:00	Governor Mode Throttle	Governor off, the servo moves with the throttle input channel
✔	0:10	Good Health Message (10sec)	This Message describes the good health state. That means, that the VBar unit does not see any error or Info Message in the last 10 Seconds.
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