Diamond Knowledge Base

Progam Cascade Modem to Work with ECM Hestia equipment

By default the Cascade modem version 3 is set from the factory to work with Diamond equipment and can be used with some other standard equipment without programming. With the ECM Hestia unit the Cascade modem needs to be programmed to interface correctly and hold the correct settings. This is done with the standard AT command set and the modem will store these commands when programmed properly. The steps below show how to program a Cascade modem using a terminal program to work with the Hestia device.

Step #1:
 Open a terminal program such as Hyperterminal and set the COM port settings to a baud rate of 19200, 8N1.
Step #2:
 Power on the Cascade Modem and plug the serial cable into the modem and your computer making sure you are on the correct COM port.
Step #3:
 Connect to the cascade modem by clicking the dial icon or start connection depending on the terminal program you are using.
Step #4:
 Type "AT" then the ENTER key in the terminal to establish a communication line to the modem. The modem should return either a "0" or an "OK" as a response. If there is no response than a proper connection has not been established unless the modem has been previously set to not respond (in case of the modem set to not respond type "ATV1" then ENTER to set the modem to provide a "OK" response to AT commands).
 Step #5:
 Once the Modem connection has been tested you will need to send the following command strings to the modem (it is important to send these commands in this order as the order in which the commands are set does matter).
 Send: "AT&F+GCI=B5" (press ENTER - Modem will return "0" or "OK")
 Send: "ATX4&D0&K0S0=3S7=60S10=7S11=70$SB9600&E12Q1V0E0" (press ENTER - modem will not return an OK as it programmed not too after this string)
 Send: "AT&Y0&W0" (press ENTER - This will store the current setting into memory)
Step #6:
 To verify the modem was properly programmed type in "AT&V" then the Enter key to have the modem print out the current settings which should match the following.

Option	Selection	ATCmd
Comm Standard	CCITT	B
CommandCharEcho	Disabled	E
Speaker Volume	Medium	L
Speaker Control	OnUntilCarrier	M
Result Codes	Disabled	Q
Dialer Type	Tone	T/P
ResultCode Form	Number	V
ExtendResultCode	Enabled	X
DialTone Detect	Enabled	X
BusyTone Detect	Enabled	X
CDC Action	Standard RS232	&C

DTR Action	Ignore	&D
V22b Guard Tone	Disabled	&G
Flow Control	Disabled	&K
Error Control Mode	V42,MNP,Buffer	\N
Data Compression	V44 V42bis MNP5	%C
AutoAnswerRing#	3	S0
AT Escape Char	43	S2
CarriageReturn Char	13	S3
Linefeed Char	10	S4
Backspace Char	8	S5
Blind Dial Pause	3 sec	S6
NoAnswer Timeout	60 sec	S7
"," Pause Time	2 sec	S8
Remote Config Char	37	S9
NO Carrier Disc	700 msec	S10
DTMF Dial Speed	70 msec	S11
Escape GuardTime	1000 msec	S12
Data Calling Tone	Enabled	S35
Line Rate	33600	S37
Handshake Speed	Fall Back Enabled	N
Xon/Xoff Pacing	Pacing Off	&E12/13
DSR Control	DSR High	&S
User Profile	Stored	&W
Break Control	\K5	\K
DTR Dialing	Off	$D
Eleven Bit	Off	$EB
Parity Bit	Even	#P
Leased HS Mode	PSTN HS	$LL
$SB Setting	9600 bps	$SB
Callback Security	Disabled	#CBS
Callback Delay	15 sec	#CBD
Callback Parity	None/Space	#CBP
Callback Inactivity	20 min	#CBI
Callback Retries	4	#CBA

Stored Phone Numbers

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 &Z0=
 &Z1=
 &Z2=
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http://support.diamondtraffic.com/knowledgemanager/questions/112/