

Recommended VMAIL Settings	Line Of Sight / Dedicated / DASA	25 kHz DAMA Circuit with ADC Mode ON	25 kHz DAMA Circuit with ADC Mode OFF	5 kHz DAMA Circuit with ADC Mode ON	5 kHz DAMA Circuit with ADC Mode OFF	5 kHz DAMA Message Service
May 23, 2003						
Communications Configuration (F7)						
COM Port		Will Vary According To PC Configuration				
Baud Rate (External Data Controllers)	38400	38400	38400	38400	38400	38400
Compression (ON/OFF)	ON	ON	N/A	ON	N/A	N/A
CSMA (ON/OFF)	ON	ON	N/A	OFF	N/A	N/A
Probe Retries	10	10	N/A	N/A	N/A	N/A
Channel Mode (Simplex/Duplex)	Duplex	Duplex	N/A	Duplex	N/A	N/A
Burst Retries	10	10	N/A	10	N/A	N/A
FEC Code Rate	1/2	1/2	N/A	1	N/A	N/A
Adaptive	ON	ON	N/A	ON	N/A	N/A
Channel Access Speed (Normal, Fast, Faster)	Normal	Normal	N/A	N/A	N/A	N/A
Use ALE (ON/OFF)	OFF	OFF	N/A	OFF	N/A	N/A
Rekey After (x) Minutes	N/A	N/A	N/A	N/A	N/A	N/A
Add'l ACK Delay	5 ^{Note 1}	5 ^{Note 1}	N/A	45 ^{Note 1}	N/A	N/A
Turn Around Delay	1 ^{Note 1}	1 ^{Note 1}	N/A	1 ^{Note 1}	N/A	N/A
Max Packets (Per Burst)	256 ^{Note 3}	256	N/A	256	N/A	N/A
TX Start Delay	0 ^{Note 2}	0 ^{Note 2}	N/A	0 ^{Note 2}	N/A	N/A
TX End Delay	0	0	N/A	0	N/A	N/A
ViaSat eMail Configuration (F8)						
<i>Configuration Item: Connections</i>						
ADC/PDC Network - DAMA Network	ADC/PDC	DAMA	DAMA	DAMA	DAMA	DAMA
For small items, prefer (Message/Circuit)	N/A	Message	Message	Message	Message	Message
For large items, prefer (Message/Circuit/DASA)	N/A	Circuit	Circuit	Circuit	Circuit	Message
For reliable delivery, prefer (Circuit/DASA)	N/A	Circuit	Circuit	Circuit	Circuit	N/A
Reliable retry method (Use ADC/PDC ACKs/Use ViaSat eMail Retries)	ADC/PDC ACKs	ADC/PDC ACKs	Retries	ADC/PDC ACKs	Retries	N/A
<i>Configuration Item: Reliable</i>						
Wait (x) seconds for ACK from recipient	N/A	N/A	60	N/A	60	N/A
Retry a maximum of (X) times	N/A	N/A	10	N/A	10	N/A
Block Size (1K, 5K, 10K)	N/A	N/A	1k	N/A	1k	N/A
<i>Configuration Item: Timeouts</i>						
Pause (x) seconds between transmitting items	32	32	32	32	32	32
Pause (x) seconds after receive before transmitting	5	5	5	5	5	5
Connections (F6)						
Active Connection	N/A	Half-Duplex	Half-Duplex	Half-Duplex	Half-Duplex	Message
Use ADC Mode	N/A	ADC Mode ON	ADC Mode OFF	ADC Mode ON	ADC Mode OFF	ADC Mode OFF
Direct Mode Parameters						
	N/A	N/A	Default Settings	N/A	Default Settings	Default Settings

Notes for Vmail Recommended Settings

Note 1: Turn Around Delay will vary from equipment to equipment. Especially when using radio's with interleavers. These recommended settings represent the "common denominator" for the wide range of possible equipment combinations. Settings greater than these values may be found to be necessary. Delays lower than the recommended values may also work and can slightly improve data throughput. Add'l ACK Delay must be adjusted proportionally with the change in Turn Around Delay.

Note 2: TX Start Delay will vary from equipment to equipment. Settings greater than these recommended values may be found to be necessary, ViaSat has established through testing that Harris brand radio's (PRC-138, PRC-150, PRC-117F) will need 0.7 seconds of TX Start Delay. Settings greater than these recommended values may be found to be necessary. Delays lower than the recommended values may also work and can slightly improve data throughput.

Note 3: When using an HF radio ViaSat recommends setting Max Packets to 128 or possibly lower due to the high error rate associated with an HF channel.