

<u>End Points</u>	<u>Distance (km)</u>	<u>Total Round Trip Delay (ms)</u>	
		<u>19.2 kbit/s</u>	<u>64 kbit/s</u>
Ottawa-Tokyo	13,000	165	145
Ottawa-London	7,500	110	90
Ottawa-Washington	750	42	12
Paris - Rome	1,200	47	17

Note: The table entries assume a zero length message and do not include computer processing time.

Table 3.3: Example Total Round Trip Delays

- d. With respect to client/server based computing, transactions per second is used as a useful measurement of capability. Table 3.4 presents the maximum possible transactions per second, assuming a zero length request and a 128 byte response, between the end-points given in Table 3.3. The message lengths for 19.2 kbits/s and 64 kbits/s transmission rates are approximately 55 ms and 16 ms respectively. Table 3.4 is included for the purpose of informing interested persons as to what sort of data base interaction can be expected; no interpretation of the impact of the numbers in Table 3.4 is made herein.

<u>End Points</u>	<u>Maximum Transactions Per Second Per Session</u>	
	<u>19.2 kbit/s</u>	<u>64 kbit/s</u>
Ottawa-Tokyo	5	6
Ottawa-London	6	9
Ottawa-Washington	10	26
Paris - Rome	10	23

Note: The transactions per second assume a zero length request, a 128 byte response, and do not include computer processing time.

Table 3.4: Example Maximum Transactions per Second

- e. To help the reader understand the impact of delays on the order of 100 ms to several hundred ms, the following example is based upon an application with which most readers will have some intuitive understanding. The application is simply one of the round trip delay requirements assuming data entry to a remote host with 'host echo'.

The intent of this example is to translate delay in ms into something which may be intuitively understood thus building an appreciation of whether some round trip delay, say 250 ms, is cause for further consideration or is acceptable for the application of interest.