Wide Area Network (WAN) Environments

The purpose of this document is to clearly state BS&A Software's caution on implementing a WAN environment.

BS&A Software's .NET applications are not designed to run over a WAN. Should you choose to attempt it, stringent requirements are necessary to accomplish this.

In order to operate our .NET applications over a WAN, our testing has shown it is necessary to have a connection speed – at minimum – of 100Mbps, with a latency of less than 17ms <u>consistently available</u> between each machine on which the application(s) is running, and the SQL database server.

> Use of a remote desktop-type connection, such as Citrix or Terminal Services, can accomplish this goal, without the need for a 100Mbps/17ms connection to the outlying building. However, for this configuration to work, a connection meeting or exceeding the 100Mbps/17ms guideline would still need to exist between the SQL database server and the application server running Citrix/Terminal Services.

> Additionally, whether using Terminal Services or some other type of connection, the machines running the application(s) (either the Terminal Server or the client machines in the outlying building) must be a part of the same subnet, with authentication to the domain.

Operating these systems over a WAN, without strict adherence to the aforementioned guidelines, is likely to result in significantly decreased performance (especially at times such as rapid batch entry, or executing updates at the remote location), chronic errors, and eventual corruption of the SQL databases.

No guarantee of performance can be made if your municipality chooses to operate over a WAN without the aforementioned connection speed in place.   Furthermore, because these performance issues fall outside of the normal BS&A customer's scope of interest, no promise of resolution to these issues can be made. Please contact the BS&A I.T. Team for alternative solutions at either itsupport@bsasoftware.com, or (855) 272-7638.