Review of Web as communications channel between databases

Two organizations, a customer and a distributor/manufacturer, communicate with each other. Each has a Web server and a database server. The organizations and their Web servers are in different physical locations and are connected over the Internet. Each Web server is in the same room as its database server and is connected to it via a local area network (Ethernet). The organizations exchange documents drawn from their databases for transactions such as orders, inquiries, advance shipping notices, invoices, and payments. All data comes from or goes into each organization’s database.

Describe the sequence of requests and responses across all components (2 databases, 2 Web servers and the networks between them) for the following transaction:

Web server 1, at the customer site, initiates a request to web server 2, at the manufacturer/distributor site, for a document listing all new products available from organization 2.

Draw a diagram and show a supporting table, if necessary. Describe the role of the following technologies in this transaction in either the diagram or table. No prose is necessary. Place the technology in an appropriately labeled place on the diagram or appropriately labeled row in a table. (This is a spreadsheet table, not a database table.) The technologies are:

- SQL query
- SQL resultset (result of a SELECT query)
- HTTP
- XHTML
- XML
- CSS
- XSLT
- DTD and XSD
- Web service
- WSDL