|  |  |
| --- | --- |
| **REST** | **SOAP** |
| Assumes a point-to-point communication model–not usable fordistributed computing environment where message may go through one or more intermediaries | Designed to handle distributed computing environments |
| Minimal tooling/middleware is necessary. Only HTTP support is required | Requires significant tooling/middleware support |
| URL typically references the resource being accessed/deleted/updated | The content of the message typically decides the operation e.g. doc-literal services |
| Not reliable – HTTP DELETE can return OK status even if a resource is not deleted | Reliable |
| Formal description standards not in widespread use. WSDL 1.2, WADL are candidates. | Well defined mechanism for describing the interface e.g. WSDL+XSD, WS-Policy |
| Better suited for point-to-point or where the intermediary does not play a significant role | Well suited for intermediated services |
| No constraints on the payload | Payload must comply with the SOAP schema |
| Only the most well established standards apply e.g. HTTP, SSL. No established standards for other aspects.  DELETE and PUT methods often disabled by firewalls, leads to security complexity. | A large number of supporting standards for security, reliability, transactions. |
| Built-in error handling (faults) | No error handling |
| Tied to the HTTP transport model | Both SMTP and HTTP are valid application *layer*protocols used as *Transport*for *SOAP* |
| Less verbose | More verbose |