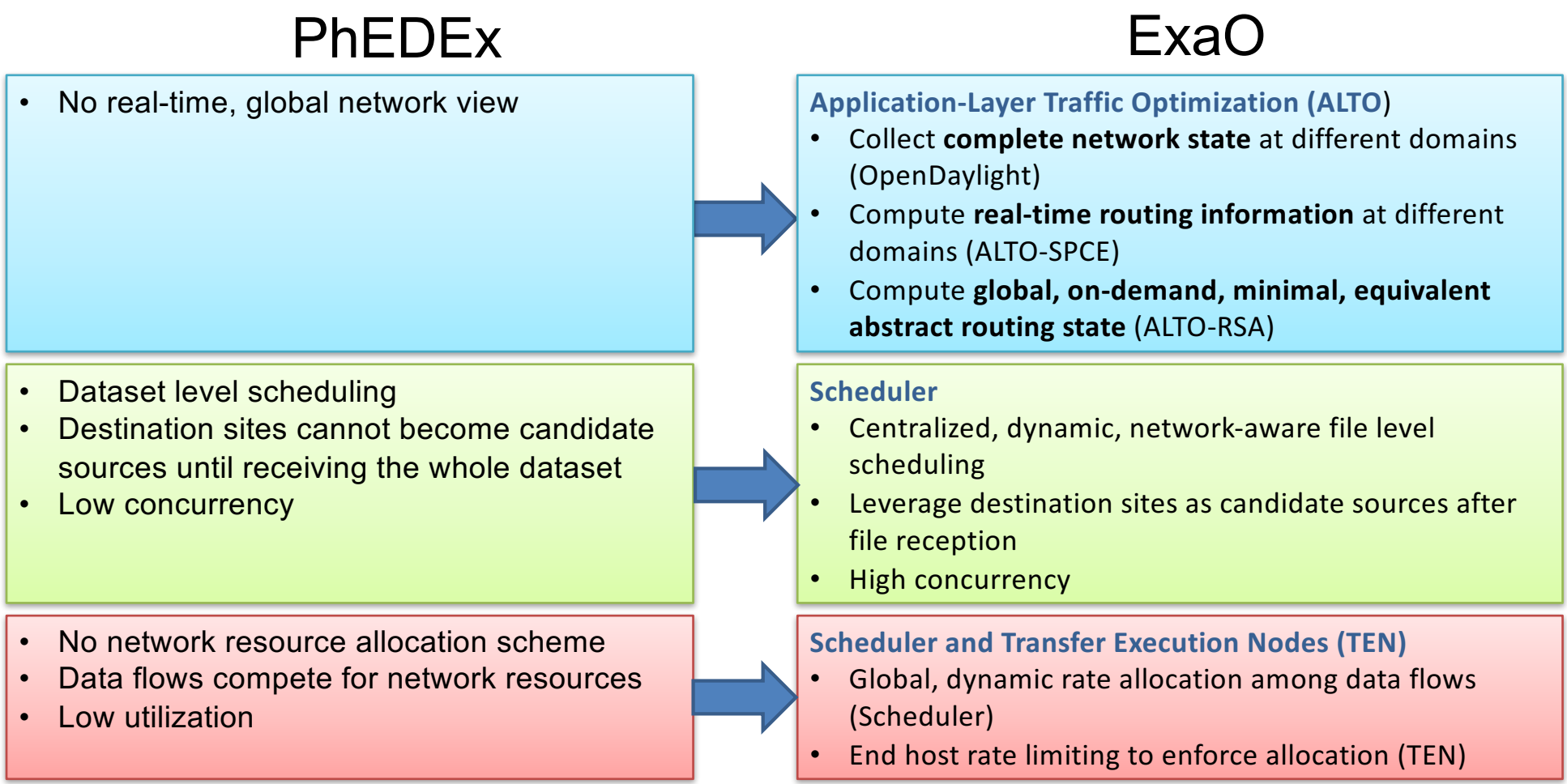
PhEDEx
ExaO
No real-time, global network view
Application-Layer Traffic Optimization (ALTO)
Collect complete network state at different domains (OpenDaylight)
Compute real-time routing information at different domains (ALTO-SPCE)
Compute global, on-demand, minimal, equivalent abstract routing state (ALTO-RSA)
Dataset level scheduling
Destination sites cannot become candidate sources until receiving the whole dataset
Low concurrency
Scheduler
Centralized, dynamic, network-aware file level scheduling
Leverage destination sites as candidate sources after file reception
High concurrency
No network resource allocation scheme
Data flows compete for network resources
Low utilization
Scheduler and Transfer Execution Nodes (TEN)
Global, dynamic rate allocation among data flows (Scheduler)
End host rate limiting to enforce allocation (TEN)