Real-time communication service architecture

Real-time communication service architecture diagram:

APPLICATIONS

VIDEO   RT CONTROL   AUDIO

QoS model

QoS model
translation

parameters

REAL-TIME COMMUNICATION API

resource

1. memory buffer

requirements

2. pkts per period

signalling   data transfer

to CLIPS

query/reply   RTCOP   CLIPS   generic

resource

admission control   resource   management

policy   reservation   mechanisms

execution   local
profiling   resources

execution
overheads

LOWER PROTOCOL STACK LAYERS
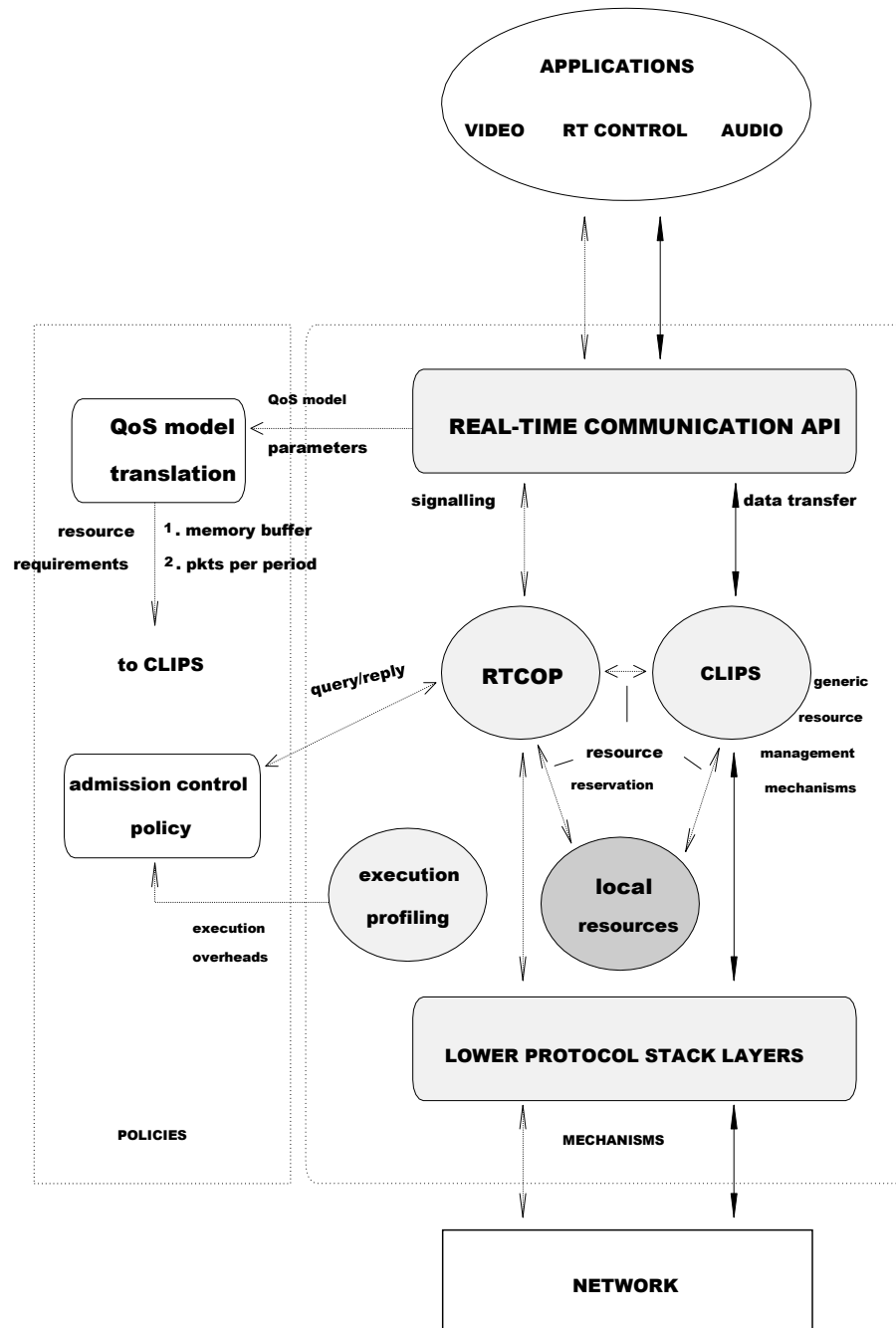
POLICIES   MECHANISMS

NETWORK

Figure.1

Real-time communication service architecture: Our implementation consists of four primary architecturalcomponents: an application programming interface (RTC API), a signaling and resource reservation protocol(RTCOP), supportfor resource managementand run-time data transfer (CLIPS), and executionprofiling support. Dashed lines indicate interactions on the control path while the data path is denoted by the solid lines.