

Agent Dialogue: Alice (Procurement) & Bob (Warehouse)

Step 1: Alice asks Bob about stock

(KQML

:sender Alice

:receiver Bob

:performative ask-one

:content

(KIF

(available-stock "television"

(size "50-inch")))

)

Step 2: Bob replies with available stock

(KQML

:sender Bob

:receiver Alice

:performative tell

:content

(KIF

(= (available-stock "television" (size "50-inch")) 120))

)

(Bob informs Alice that 120 units of 50-inch televisions are in stock.)

Step 3: Alice asks about HDMI slots

```
(KQML
  :sender Alice
  :receiver Bob
  :performative ask-one
  :content
    (KIF
      (hdmi-slots "television"
        (size "50-inch")))
  )
```

Step 4: Bob replies with specification

```
(KQML
  :sender Bob
  :receiver Alice
  :performative tell
  :content
    (KIF
      (= (hdmi-slots "television" (size "50-inch")) 3))
  )
```

(Bob informs Alice that each 50-inch television has 3 HDMI slots.)