



KDE4

Decibel – You are not alone!

<http://decibel.kde.org/>

Dipl.-Technoinform.
Tobias Hunger
basysKom GmbH

What is the fuss about?



What do we want to do?



Decibel will be a real time communications framework

What is real time communication

- Instant Messaging
- VoIP/Video conferencing
- Computer Telephone Integration (CTI)

Why a framework?

- communication is one of the fundamental use cases of computers
- integrated communication is a prerequisite of collaboration



Which technologies exist?

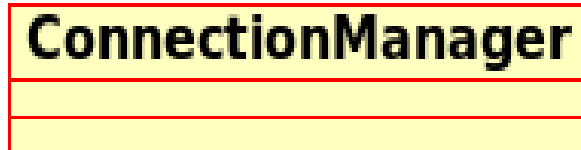


Telepathy is a RT communications infrastructure

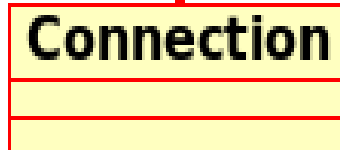


- Defines DBus interfaces to access RT communication services
 - desktop independent specification
 - low level API
- hosted at freedesktop.org
- Implementation of jabber protocol is available, used in existing products.
- Gnome seems to be heading into this direction

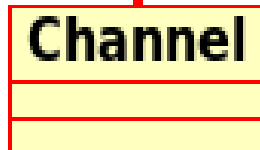
URL: <http://telepathy.freedesktop.org/wiki/>



creates



creates



Connection Manager:

- Implements protocol(s)

Connection:

- Represents one connection to one server using one of the protocols supported by the Connection Manager

Channel:

- Represents one class of information transmitted over a connection



Tapioca used to be a infrastructure competing with Telepathy.
Today they implement the Telepathy specification.

- Qt Bindings for Telepathy (QtTelepathy) with raw DBus bindings
- “Convenience wrapper” QtTapioca hiding some of the messier details



URL: <http://tapioca-voip.sourceforge.net/wiki/index.php/Tapioca>

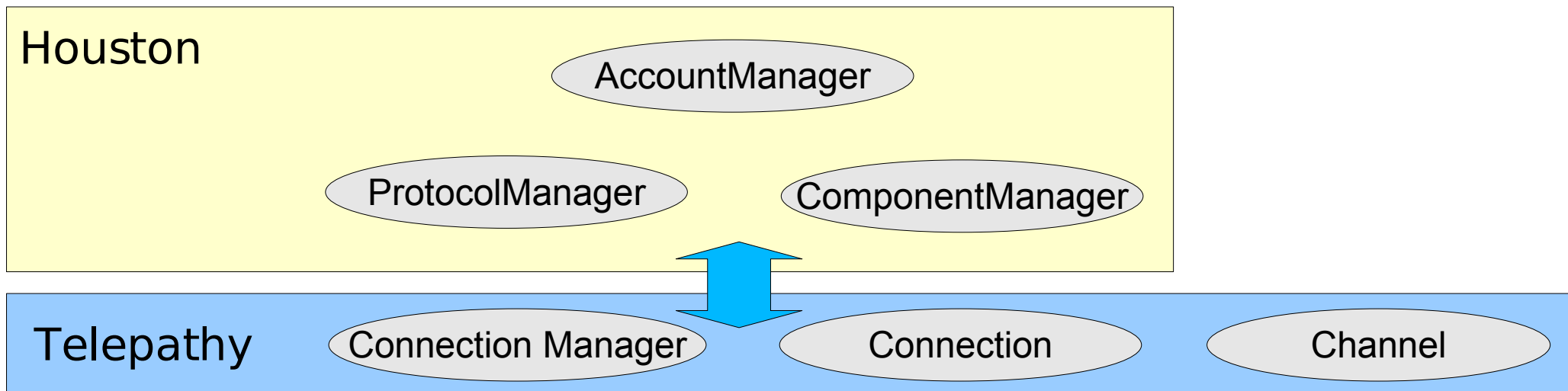
Why Decibel?



What will Decibel offer in addition to all that?



- Provides desktop independent DBus interfaces to high level RT communication features.
- Persistently stores user data (accounts, preferences, etc.)
- Starts/stops Connection Managers as required
- Starts/stops desktop dependent components as required.





The AccountManager persistently stores the user's account data in one central place including:

- Connectivity information (account is online/offline)
- Visibility information (hidden, free to chat, etc.)
- Privacy information (invisible to user X, etc.)
- etc.



ProtocolManager encapsulates Telepathy's Connection Managers:

- Holds a list of Connection Managers installed with supported protocols
- Selects Connection Manager to use for a protocol
- Persistently stores preferred Connection Managers
- Uses the data stored in the AccountManager to bring up Connection Managers as requested.



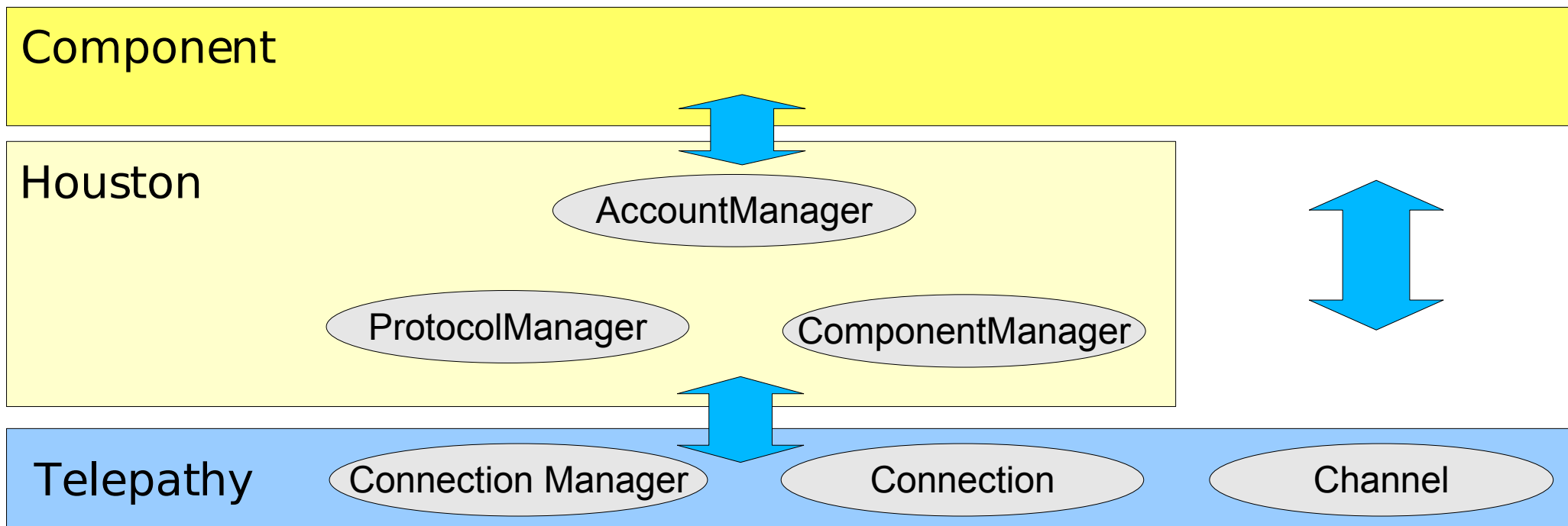
The ComponentManager

- is a registry for components.
- stores the user's preferences on which component is supposed to handle which kind of channel
- is notified on New Channel events
- decides what do do with a new channel by deciding on which component to use to handle it.



Specialized applications started by Houston

- Desktop specific!
- Handle one specific task well
- Work in concert with Houston and other componets





Where is the code?



We are behind schedule :-)

- Mostly due to HR issues

But we got some things done already:

- Qt bindings to Telepathy were missing [done]
- QtTapioca was launched to make writing applications like Houston easier [in progress]
- Houston implementation [started]
- KDE specific components

Your help is welcome!



PS:



Please consider participating in the BoF Session

“Realtime Communication & Collaboration”

on

Tuesday, September 26th, 6pm to 7pm, LB04

