Why Are We Talking?



How the Purpose of Conversation Impacts Bot Design

Sondra Ahlén sondra@savicvoice.com

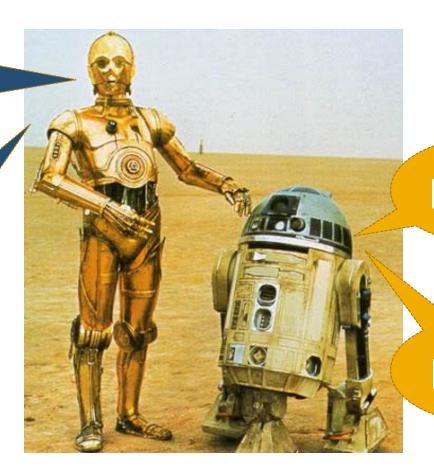
> Conversational Interaction Conference 2017 San Jose, CA



Why Do Bots Talk?

"I am fluent in over six million forms of communication...."

"...Don't blame me.
I'm an interpreter.
I'm not supposed to
know a power
socket from a
computer terminal.."



[beeps]

[chirps]



For Good or Bad...

Good Janet



Sweet, quirky, helpful

Bad Janet





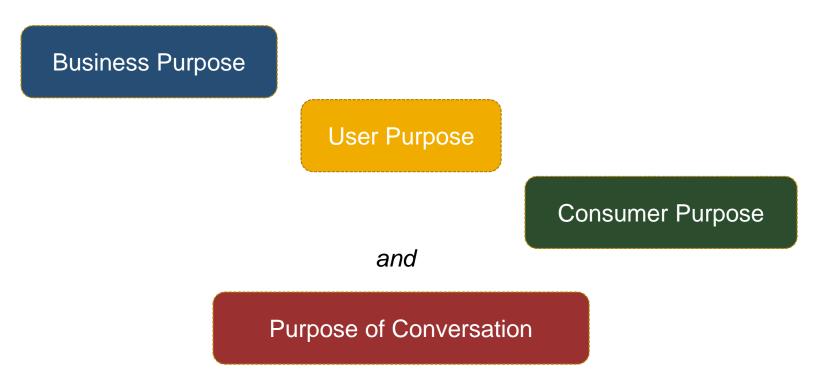
Good Janet's demonic counterpart

Neighborhood Intelligent Personal Assistant (IPA) robot



Multiple Purposes

 Multiple purposes for the creation and use of language-interaction bots that impact design





Hang Up Or Stick Around

Business 1 Purpose:

Reduce agent time, telephony fees

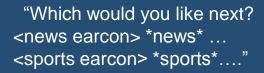
Customer Service IVR

Design:

- Self-service tasks
- Get to 'right agent'
- Persona: Best agent
- Encourage hang up

Business 2 Purpose:

Increase subscription revenues







"If you're done, simply hang up. Otherwise, which would you like next?..."

Entertainment Voice Portal

Design:

- Stay on the line, browser
- Entertainment quality & sounds
- Main persona: Broadcaster
- Persona for each category



Alarms and News



Intelligent Assistant

"Ok..., set my alarm to 6:15 AM"



"What's in the news today?"



User 1 Purpose:

- Make life easier
- Change alarm time hands-free

User 2 Purpose:

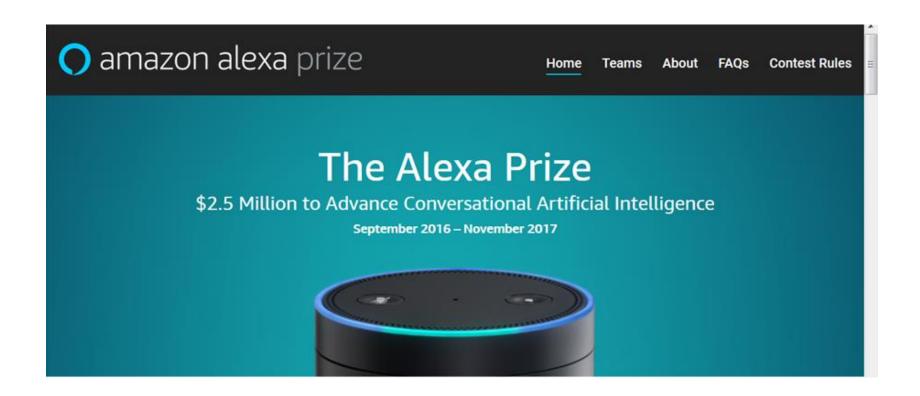
- Keep informed on the go
- Daily news briefs, fav sources

Design:

- Multi-modal smart phone or voice device, Intelligent Assistant
- Downloadable alarm clocks and other apps, news and entertainment
 - IA persistently available, sends commands to apps
 - Room for Improvement: Better interface with apps



Engaging Conversation



Contest for Conversational AI: "...university teams...building a socialbot that can converse coherently and engagingly with humans on popular topics for 20 minutes."



Why Do Humans Talk?

Purpose of Conversation:

- Practical: naming, actions, requests, commands
- Social connection
- Sharing information
- Negotiation and trade, collaboration
- Entertainment and education
- To Inspire and persuade
- Make someone feel good or bad





Social Conversations





Why Social Bots?

Example: Hello Barbie doll

- Business purpose:
 - General: Increase income, market share
 - Specific: Introduce innovative product to established market
 - Encourage sales through marketing: 'best friend'
- User purpose (child):
 - Have fun, have a friend
- Consumer purpose (parent for child):
 - Safe fun interactive play, games and talk
 - Practice social conversation
 - Boost self-esteem, provide companion





Barbie Keeps It Going...

Yay! You're here!"

"I know what we can talk about!"



You see, there's something I wanted to share with you...

Hey! Do you ever get in a curious mood?

"I was reading about [elephants]... The most interesting thing I learned is that elephants can get sunburned. ... Isn't that wild?"



What Customers Like...

Positive:

"Her conversational abilities are fairly strong, ... and she is SUPER positive. Example: "Barbie, am I pretty?" "Of course I think you're pretty. But you're also smart, talented, and funny, and that's way more important!" <--that. I want my daughter to hear that."

"The adventures and general knowledge is incredible.... This is a great toy that sparks imagination...."

"...her phrases, prompts, and responses ... improve over time."

"My sister really loves it it's so good she has lots of fun with it"



...With Room to Grow...

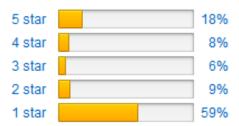
Room for Improvement:

- Battery charger and wifi connection issues
- Security, privacy, and ethics concerns
- Continue improving conversation abilities
 - Listen better and understand more

Customer Reviews



2.3 out of 5 stars ▼



"She tends to interrupt my daughter..."

"...she told some interesting stories. but the interaction was minimal and felt stilted"



Missing the Mark?

When a conversational product or service fails to meet the needs of the consumer or user, that may hinder the business purpose and even the use of the bot.



"We have been without an interpreter since our master got angry with our last protocol droid and disintegrated him."

-Star Wars HR droid EV9D9 while interviewing C3PO



"Disintegrated?!?"



How Do We Improve?

- Review feedback and unexpected responses
- Listen more, understand intent
- Update and improve over time
- Remember context that has been discussed
- Smoother and deeper interaction with other apps
- Align product features and technology
- Personalize interactions without being creepy
- Design conversation style and persona
 - E.g. Aim less, meander and delight more
 - But keep it effective and appropriate!





Design With Purpose

Whether a customer service IVR or chat bot, an intelligent assistant, artificial intelligence, friend, companion, or demonic robotic nemesis,

Design bots with purpose in mind!

Business, User, and Consumer Purpose Purpose of Conversation



"Dave, this conversation can serve no purpose anymore. Goodbye." -Hal9000, 2001: A Space Odyssey

Let's Keep Talking



SAVIC

- Sondra Ahlén Voice Interface Consulting
- Principal VUI Consultant/Owner
- sondra@savicvoice.com
- 925-25\$AVIC (925-257-2842)