

IBM Bluemix Watson Dialog Services

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for students CVUT FEL, April 27 2016

Overview

- Bluemix PaaS – introduction to the platform
- Prague R&D lab
- Who is Watson ?
- NL related services
 - Dialog,
 - ASR,
 - TTS
- UI specifics for NLP in cloud



IBM Bluemix

The Digital Innovation Platform

[GET STARTED FREE](#)

BUILD

EXTEND

SCALE

INTEGRATE

FEATURED

Build your apps, your way.

Use a combination of the most prominent open-source compute technologies to power your apps. Then, let Bluemix handle the rest.

Instant Runtimes

App-centric runtime environments based on Cloud Foundry.

IBM Containers

Portable and consistent delivery of your app without having to

Virtual Machines

Get the most flexibility and control over your environment with VMs.

Bluemix

The screenshot displays the IBM Bluemix dashboard. At the top, the navigation bar includes 'DASHBOARD', 'SOLUTIONS', 'CATALOG', 'PRICING', 'DOCS', and 'COMMUNITY'. The user's organization is 'tomas_macek@cz.ib...'. The main content area is divided into two primary sections: 'Cloud Foundry Apps' and 'Services & APIs'. The 'Cloud Foundry Apps' section shows '2 GB/2 GB Used' and a 'CREATE APP' button. The 'Services & APIs' section shows '4/10 Used' and a 'USE SERVICES OR APIS' button. Below these are three application cards, each with a gear icon for settings and a 'Running' status indicator. The first card is 'dialog-tool-tmacek-1617' with a .js icon and four other service icons. The second card is 'natural-language-classifier-node...' with a .js icon and four other service icons. The third card is 'TMNodeJSFirst' with a .js icon and one other service icon.

- Service vs application,
- credentials

- tmacek | dialog-tool-tmacek-1617
 - .git
 - config
 - dialogs
 - launchConfigurations
 - public
 - views
 - .cflignore
 - .gitignore
 - .jshintignore
 - .jshintrc
 - app.js**
 - CONTRIBUTING.md
 - LICENSE
 - License.txt
 - manifest.yml
 - package.json
 - project.json
 - README.md

```
1 /**
2  * Copyright 2015 IBM Corp. All Rights Reserved.
3  *
4  * Licensed under the Apache License, Version 2.0 (the "License");
5  * you may not use this file except in compliance with the License.
6  * You may obtain a copy of the License at
7  *
8  *     http://www.apache.org/licenses/LICENSE-2.0
9  *
10 * Unless required by applicable law or agreed to in writing, software
11 * distributed under the License is distributed on an "AS IS" BASIS,
12 * WITHOUT WARRANTIES OR CONDITIONS OF ANY KIND, either express or implied.
13 * See the License for the specific language governing permissions and
14 * limitations under the License.
15 */
16
17 'use strict';
18
19 var express = require('express'),
20     app = express(),
21     request = require('request'),
22     bluemix = require('./config/bluemix'),
23     extend = require('util')._extend;
24
25 // Bootstrap application settings
26 require('./config/express')(app);
27
28 console.log('TM test1');
29
30 // if bluemix credentials exists, then override local
31 var credentials = extend({
32   url: '<url>',
33   username: '<username>',
34   password: '<password>'
35 }, bluemix.getServiceCreds('dialog')); // VCAP_SERVICES
36
37 if (credentials.url.indexOf('/api') > 0)
38   credentials.url = credentials.url.substring(0, credentials.url.indexOf('/api'));
39
40 // HTTP proxy to the API
41 app.use('/proxy', function(req, res) {
42   var newUrl = credentials.url + req.url;
43   req.pipe(request({
44     url: newUrl,
45     auth: {
46       user: credentials.username,
```

nacek@c... Type here to search

Services // The building blocks of any great app

Watson

Build cognitive apps that help enhance, scale, and accelerate human expertise



AlchemyAPI
IBM



Concept Expansion
IBM BETA



Concept Insights
IBM



Dialog
IBM BETA



Language Translation
IBM



Natural Language Classifier
IBM



Personality Insights
IBM



Question and Answer
IBM BETA



Relationship Extraction
IBM BETA



Speech To Text
IBM



Text to Speech
IBM



Tradeoff Analytics
IBM












Visual Recognition
IBM BETA




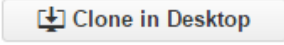
Cognitive Commerce™
Third Party

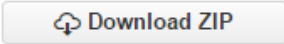



Cognitive Graph
Third Party

 .gitignore	initial commit	2 months ago
 .jshintignore	initial commit	2 months ago
 .jshintrc	initial commit	2 months ago
 CONTRIBUTING.md	initial commit	2 months ago
 LICENSE	initial commit	2 months ago
 README.md	Update README.md	24 days ago
 app.js	add beta service	26 days ago
 manifest.yml	Update manifest.yml	6 days ago
 package.json	initial commit	2 months ago

You can clone with [HTTPS](#), [SSH](#), or [Subversion](#). 





 **README.md**

Dialog Tool

The Dialog Tool enables you to create, manage, and interact with dialogs for the IBM Watson [Dialog service](#).

Give it a try! Click the button below to fork into IBM DevOps Services and deploy your own copy of this application on Bluemix.



Getting started

1. Create a Bluemix account. [Sign up](#) in Bluemix or use an existing account. Watson services in beta are free to use.

PROJECT MANAGEMENT

The screenshot displays the IBM Bluemix DevOps Services interface. At the top, the browser address bar shows the URL <https://hub.jazz.net>. The page header includes the IBM Bluemix DevOps Services logo and navigation links for DASHBOARD, MY PROJECTS (which is highlighted), EXPLORE, HELP, BLOG, and COMMUNITY. Below the header, there is a search bar for projects and a dropdown menu set to 'All My Projects'. A sidebar on the left contains navigation options for PROJECTS, INVITATIONS, and REQUESTS. The main content area features a large 'CREATE PROJECT' button with a plus sign. Below this, a list of project cards is shown, each with a user icon, a project name, and a brief description. The projects listed are:

- tmacek | clientv2t**: This project is derived from dialog (v1) project pizza demo. Its purpose is to quickly provide a...
- tmacek | dialog-tool-tmacek-012**
- tmacek | dialog-tool-tmacek-1446**
- tmacek | dialog-tool-tmacek-1617**
- tmacek | ibmwatson-nlc-groundtruth-tmacek-1648**

Each project card includes a gear icon for settings, a lock icon, and icons for editing, checking, and sharing.

STAGE

The screenshot shows a web browser window with three tabs: "Dashboard - IBM Bluemix", "clientv2t Pipeline - IBM Bluemix...", and "V2 Dialog Client". The address bar shows the URL "https://hub.jazz.net/pipeline/tmacek/clientv2t". A notification banner at the top states: "Your project workspace has outgoing changes. Go to the [Git page](#) to commit and push your changes if you want to include them in your deployed application." Below the notification, the pipeline is titled "Pipeline: All Stages". Two stages are visible: "Testing (clientv2t) deploy" and "IBM Public (clientv2) deploy". A "+ ADD STAGE" button is located to the right of the stages. Each stage card displays "STAGE PASSED", "LAST INPUT" (including a Git commit by Tomas Macek), "JOBS" (Build and Deploy), and "LAST EXECUTION RESULT" (Build and clientv2).

Dashboard - IBM Bluemix x clientv2t Pipeline - IBM Bluemix... x V2 Dialog Client x +

https://hub.jazz.net/pipeline/tmacek/clientv2t

Watson Dialog Most Visited Dochazka, dovolena Buy On Demand - Bo... IBM - Expense Reimb... e-Asset Management ... LimeSurvey IBM Watson Dialog Meetings WDS

i Your project workspace has outgoing changes. Go to the [Git page](#) to commit and push your changes if you want to include them in your deployed application.

Pipeline: All Stages

Testing (clientv2t) deploy ▶ ⚙️

STAGE PASSED

LAST INPUT [Git URL](#)

Last commit by Tomas Macek 54 min ago
[minor config change](#)

JOBS [View logs and history](#)

- Build Succeeded 44 min ago
- Deploy Succeeded 43 min ago

LAST EXECUTION RESULT

Build 38 [↶ ↷](#)

clientv2t
clientv2t.stage1.mybluemix.net ●
[View runtime log](#)

IBM Public (clientv2) deploy ▶ ⚙️

STAGE PASSED

LAST INPUT Stage: Testing (clientv2t) dep...

Build 38 [↶ ↷](#)

JOBS [View logs and history](#)

- Build Succeeded 42 min ago
- Deploy Succeeded 41 min ago

LAST EXECUTION RESULT

Build 21 [↶ ↷](#)

clientv2
clientv2.stage1.mybluemix.net ●
[View runtime log](#)

Build 38 [↶ ↷](#)

+ ADD STAGE

GIT INTEGRATION

The screenshot displays the IBM Bluemix DevOps Services interface for a Git repository. The browser address bar shows the URL: `https://hub.jazz.net/code/git/git-repository.html#/code/gitap/clone/file/tmacek-OrionContent/tmacek | clientv2t`.

The interface is divided into several sections:

- Repository:** Shows the current repository as `tmacek | clientv2t` and the reference as `master => origin/master`. Buttons for `EDIT CODE`, `TRACK & PLAN`, and `BUILD & DEPLOY` are visible.
- Active Branch (master):** Includes a `Sync` button and a `Working Directory Changes` section indicating `1 file changed. 1 file ready to commit.`
- Outgoing (0):** Shows `No Changes` with a `Push` button.
- Incoming (24):** Lists recent commits with details such as `minor config change...` and `Minor fixes in configuration, this version seems to have fully functioning configuration option with...`.
- Commit Message:** A text input field for entering the commit message, with an `Amend previous commit` checkbox and a `more ...` link.
- Diff View:** Shows a comparison of `package.json` files. The left pane shows the original file, and the right pane shows the modified file. The `"start": "node app.js"` line is highlighted in both panes.

HOLMES & WATSON

de Eduard Costa



Who is Watson: Dr. Watson is the friend and assistant of the greatest detective of all ages



Born	Thomas John Watson February 17, 1874 Campbell, New York, U.S.
Died	June 19, 1956 (aged 82) New York City, New York, U.S.
Occupation	Chairman and CEO of IBM 1914- 1956, business

THINK". Watson began using "THINK" to motivate, or inspire,

Chairman and CEO of IBM



T. J. Watson research Center

On February 14, 2011, IBM Watson made history



IBM computer which made the history

IBM Prague R&D Lab
Watson Dialog Services



Selected Watson services

The screenshot shows the IBM Watson Services Catalog interface. The browser address bar displays <https://console.eu-gb.ibm.com/catalog/>. The navigation menu includes DASHBOARD, SOLUTIONS, CATALOG (highlighted), PRICING, DOCS, and COMMUNITY. A search bar is present with the text "Type here to search".

The main content area is titled "Services // The building blocks of any great app". Under the "Watson" section, there is a description: "Build cognitive apps that help enhance, scale, and accelerate human expertise".

The services are displayed in a grid of 15 items, each with an icon, name, and provider:

Service Name	Provider
AlchemyAPI	IBM
Concept Expansion	IBM BETA
Concept Insights	IBM
Dialog	IBM BETA
Language Translation	IBM
Natural Language Classifier	IBM
Personality Insights	IBM
Question and Answer	IBM BETA
Relationship Extraction	IBM BETA
Speech To Text	IBM
Text to Speech	IBM
Tradeoff Analytics	IBM
Visual Recognition	IBM BETA
Cognitive Commerce™	Third Party
Cognitive Graph	Third Party



Natural Language Classifier

The IBM Watson Natural Language Classifier service applies deep learning techniques to make predictions about the best predefined classes for short sentences or phrases. The classes can trigger a corresponding action in an application, such as directing a request to a location or person, or answering a question. After training, the service returns information for texts that it hasn't seen before. The response includes the name of the top classes and confidence values.

[🔗 Resources:](#)

- [API Overview](#)
- [Documentation](#)
- [Fork on Github](#)

Try the service

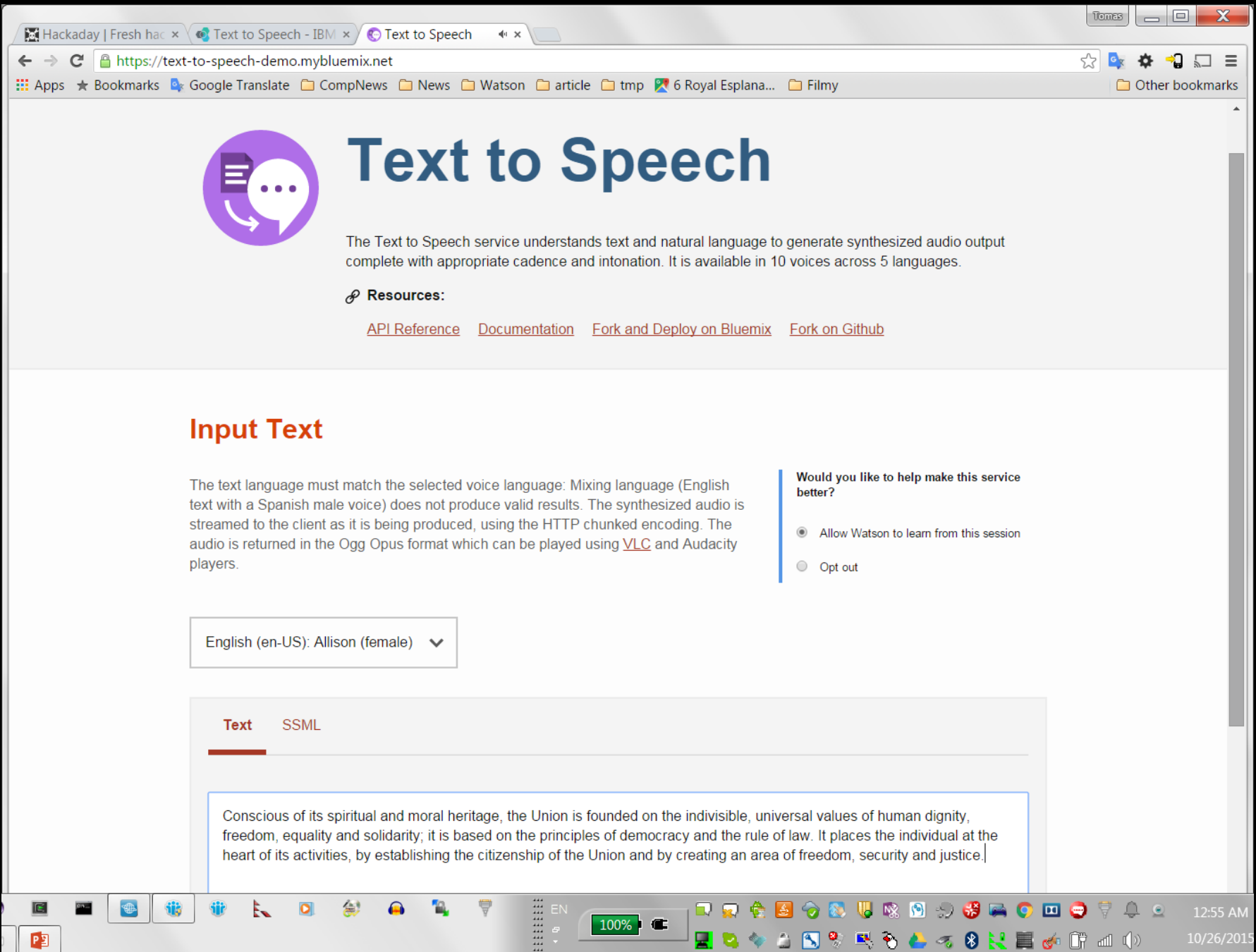
Ask a question about the weather

Watch the Natural Language Classifier categorize your weather-related question. In this demo, the classifier is trained to determine whether the question is related to *temperature* or *weather* conditions. The output includes the top classification and a confidence score.

Sample questions

- Is it hot outside?
- What is the expected high for today?
- Will it be foggy tomorrow morning?
- Should I prepare for sleet?
- Will there be a storm today?

The classifier often scores well with terms that it hasn't been trained on. In the sample questions, the words "sleet," "foggy," and "typhoon" are not part of the [training data](#), yet the classifier correctly handles questions about them.



Text to Speech

The Text to Speech service understands text and natural language to generate synthesized audio output complete with appropriate cadence and intonation. It is available in 10 voices across 5 languages.

Resources:

- [API Reference](#)
- [Documentation](#)
- [Fork and Deploy on Bluemix](#)
- [Fork on Github](#)

Input Text

The text language must match the selected voice language: Mixing language (English text with a Spanish male voice) does not produce valid results. The synthesized audio is streamed to the client as it is being produced, using the HTTP chunked encoding. The audio is returned in the Ogg Opus format which can be played using [VLC](#) and Audacity players.

Would you like to help make this service better?

- Allow Watson to learn from this session
- Opt out

English (en-US): Allison (female) ▼

Text SSML

Conscious of its spiritual and moral heritage, the Union is founded on the indivisible, universal values of human dignity, freedom, equality and solidarity; it is based on the principles of democracy and the rule of law. It places the individual at the heart of its activities, by establishing the citizenship of the Union and by creating an area of freedom, security and justice.



Speech to Text

The IBM Watson Speech to Text service uses speech recognition capabilities to convert English, Spanish, Brazilian Portuguese and Mandarin speech into text.

[🔗 Resources:](#)

[API Reference](#) [Documentation](#) [Fork on Github](#) [Fork and Deploy on Github](#)

Transcribe Audio

Use your microphone (compatible only with [Google Chrome](#) and [Mozilla Firefox](#)), upload pre-recorded audio (WAV containing uncompressed audio or FLAC file formats), drag and drop recorded audio onto the page, or use the audio samples provided. The returned text includes metadata that provides the timestamps for start and end times of individual words, confidence scores behind those words, and alternative hypotheses for phrases.

Would you like to help make this service better?

- Allow Watson to learn from this session
- Opt out

US English broadband model (16KHz) ▼



Record Audio



Select File



Play Sample 1



Play Sample 2

Text

JSON

CONVERSATIONAL APP (IN THE WATSON DIALOG SERVICE)

- What it is
 - Artificial agent that takes dialog turns with the user
 - Runtime Engine + Development Environment
 - Text in, text out
 - Can be used in conjunction with Speech-To-Text and Text-To-Speech
- What it is not
 - 100% accurate
 - Full replacement for human assistants
 - IDE for authoring full UX
 - Stateless FAQ or question answering system

S: Welcome to *Utility 1*. What can I help you with today?

U: Hello

S: Hi there!

U: What are my payment options?

S: There are many ways to pay your bill;

- Credit Card
- Cash
- Fixed or Direct Debit

U: Pay by card

S: You can pay by credit/debit card using your online account, or without it on our website.

DIALOG DEVELOPMENT ENVIRONMENT – FLOW EDITOR

The screenshot displays the Watson Dialog Flow Editor interface. The main window is titled "Watson Dialog Name: faq_cls_sample User: faq_cls_sample". The interface is divided into several sections:

- Flow Editor:** A tree view on the left shows the dialog structure. The "Flow" section includes a "Main" node with a "Hi there! Let's chat!" node, followed by a "Get User Input" node. This node branches into three "Search" nodes: "Search: Personality", "Search: FAQ", and "Search: Chitchat-vague". A "Default" node follows, leading to a "Hi there! Let's chat!" node. The "Library" section includes an "FAQ" folder with a "help" node. Below this, a list of input nodes (I) and output nodes (O) are shown, such as "I can answer a couple of frequently asked questions about E.ON", "Who is E.ON?", "E.ON is one of the world's largest investor-owned power and g...", "What does Group Management do?", "The main task of Group Management in Düsseldorf is to overse...", "What does the Generation global unit do?", "Our Generation global unit oversees and coordinates the opera...", "What does the Renewables global unit do?", "Our Renewables global unit plays a key role in expanding rene...", "What does the New Build and Technology global unit do?", "The New Build & Technology global unit brings together our pr...", "What does the Exploration and Production global unit do?", "Our Exploration & Production segment is a growth business wit...", "What does the Global Commodities global unit do?", "As the link between E.ON and the world's wholesale energy ma...", "What does the Germany regional unit do?", "Our Germany regional unit is responsible for power and gas di...", "What does the U.K. regional unit do?", "Our U.K. regional unit is a leading power and gas retailer in...", "What does the Sweden regional unit do?", "Our Sweden regional unit supplies a total of about one millio...", "What does the Italy regional unit do?", "E.ON Italia, the lead company of our Italy regional unit is...
- Node Editor:** The right side of the interface shows the "Input Node" editor. It displays a "help" node with a "Variations" section containing the following links: [what can I say](#), [what do you know](#), [what may I ask you](#), and [tell me what you know](#).
- Chat Window:** A separate window titled "Mozilla Firefox: IBM Edition" shows a chat interface. The user input is "You said: need help". The system response is "I can answer a couple of frequently asked questions about E.ON from their website."

DIALOG IDE – VIEW CONVERSATIONS, OPTIMIZE

Date/Time	# Messages	Read	Feedback	Channel	Confidence	Optimized	Id
Tue 12 Apr 2016 at 3:03:39 PM	3	Yes	No	Web Chat	100%	No	3413
Tue 22 Mar 2016 at 2:30:57 PM	15	Yes	No	Web Chat	100%	No	3234
Mon 28 Dec 2015 at 2:11:46 AM	5	No	No	Web Chat	100%	No	1180
Mon 28 Dec 2015 at 2:01:43 AM	7	No	No	Web Chat	66%	No	1179
Thu 26 Nov 2015 at 5:24:49 AM	3	No	No	Web Chat	100%	No	754

Do not show chats that have only 1 message

From To

Messages

Profile

Hits

Feedback

Info

Date/Time	From	Message	
Tue 22 Mar 2016 at 2:31:02 PM	IBM Watson	Hi there! Let's chat!	
Tue 22 Mar 2016 at 2:31:13 PM	HUMAN	What do you do?	<input type="button" value="Optimize"/>
Tue 22 Mar 2016 at 2:31:24 PM	IBM Watson	E.ON is one of the world's largest investor-owned power and gas companies. At facilities across Europe, Russia, and North America, our more than 62,000 employees generated more than	
Tue 22 Mar 2016 at 2:31:40 PM	HUMAN	help	<input type="button" value="Optimize"/>
Tue 22 Mar 2016 at 2:31:41 PM	IBM Watson	I can answer a couple of frequently asked questions about E.ON from their website.	
Tue 22 Mar 2016 at 2:32:02 PM	HUMAN	how can i pay	<input type="button" value="Optimize"/>
Tue 22 Mar 2016 at 2:32:03 PM	IBM Watson	There are many ways to pay your bill; <ul style="list-style-type: none"> ● Fixed or variable Direct Debit ● Cash ● Cheque ● Credit card ● Debit card ● BACs 	

Understood
 Needed Clarification
 Didn't Understand

WHY CREATE CONVERSATIONAL APPS?

- Enable customer / employee self-service through multiple channels
- Ready 24x7, no queues for human operators
- Even several % of traffic handled by WDS save human labor from routine tasks suitable for automation to complex tasks that really require human in the loop
- Consistent answers, can be “retrained” instantly, needs little tutoring
- Typical Tasks for Dialog
 - FAQ with disambiguation
 - Chit-Chat
 - Transactional and Form-filling tasks
 - Problem-solving
 - Mixture of the above
- Delivery channels
 - Mobile or desktop, typing and/or clicking
 - Speech, GUI, Robot (multi-modal)
 - Phone

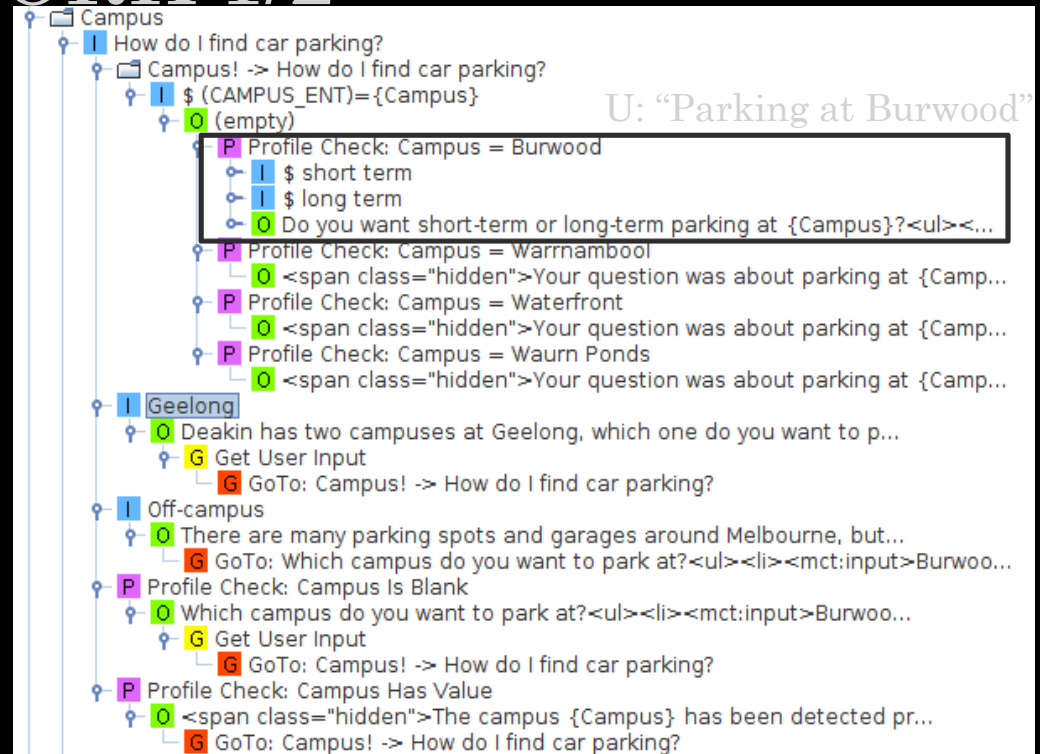
HOW DOES IT WORK 1/2

- Combination of scripted and statistical techniques

- Flow and understanding done using a “visual programming language” of dialog nodes



- input nodes with matching rules
- search nodes that group input nodes
- output nodes
- profile checks (conditions)
- profile rules (variable sets)
- get user input (explicit)
- goto's



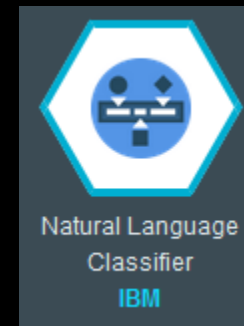
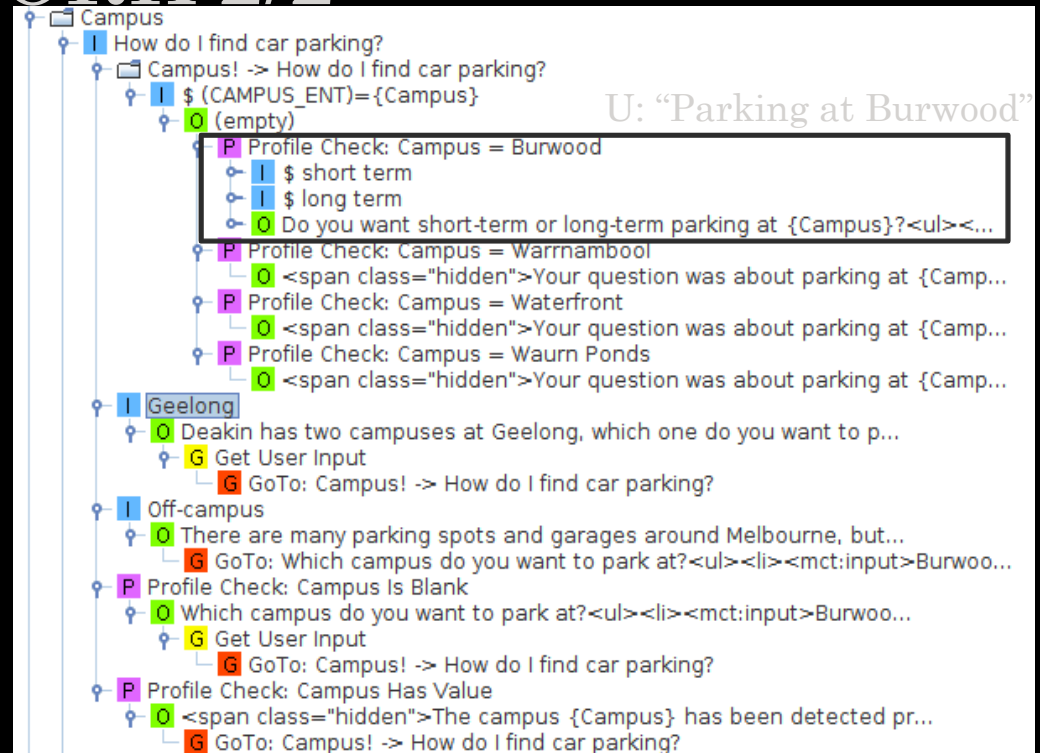
- Rule-based input understanding
 - input nodes contain simple matching patterns like
 - “\$ car parking” – matches any sentence that contains “car parking”
 - “park * car” – matches “park my car”, “park my friends car” etc.
 - predictable, but large patterns sets are hard to manage

HOW DOES IT WORK 2/2

- Combination of scripted and statistical techniques

- Statistical input understanding

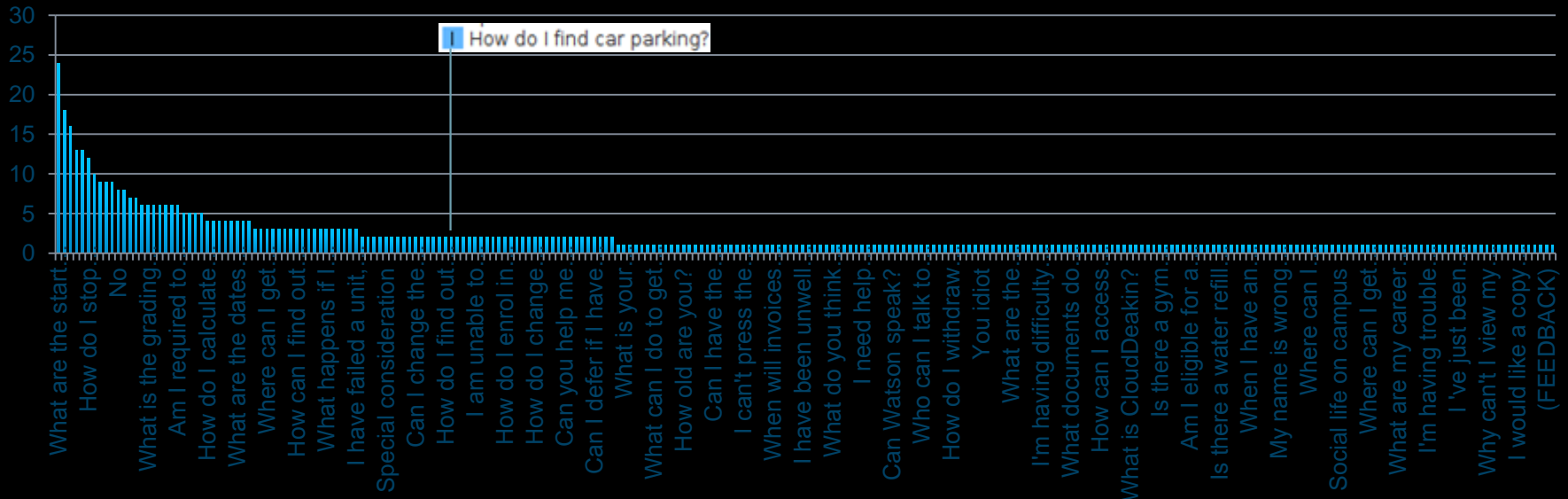
- instead of patterns, input nodes contain training samples
- trained model classifies user input to the best matching input node (class)
- often outperforms rules from moderate samples set sizes
- generalizes better, easier to author
- behind the scenes, Dialog integrates with the NL Classifier Service (dark feature)



STATISTICAL VS. RULE-BASED UNDERSTANDING

- An Input Node represents an expected user question (intent, class). Multiple, different user questions match to the same, single Input node.
 - Contextual: Different Input Nodes active during various stages of Conversation
- User phrase is matched to an Input Node either based on
 - Matching Rules like " \$ parking " (phrase contains "parking")
 - Example phrases used to train the Natural Language Classifier running in the background

Hit Count



Input nodes ordered by frequency of being hit within a period of time

STATISTICAL VS. RULE-BASED UNDERSTANDING

- An Input Node represents an expected user question (intent, class). Multiple, different user questions match to the same, single Input node.
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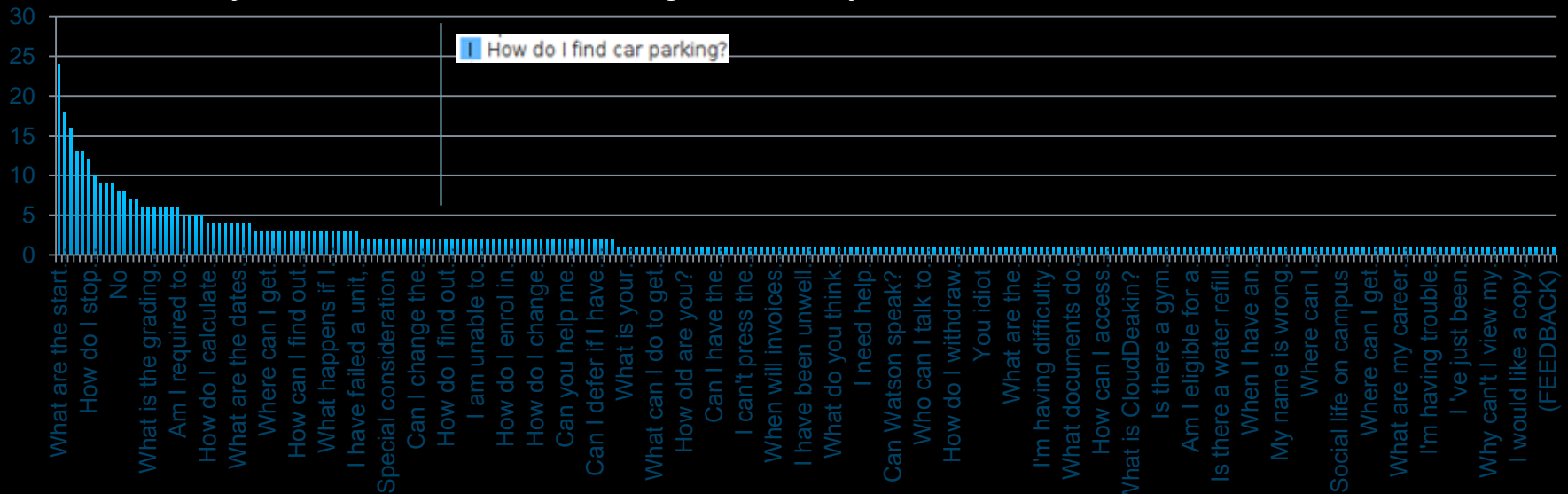
Hit Count

Fat Head:

Statistical Classifier best here

Long Tail:

Matching Rules or Info Retrieval best

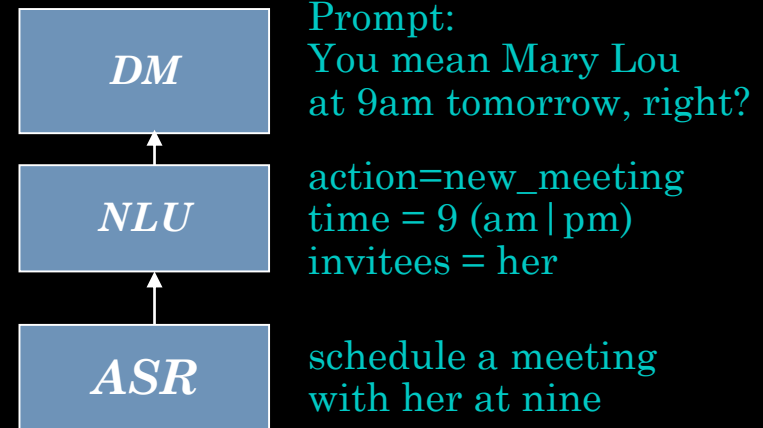


- Hybrid: high-precision rules cover "exact matches" and take precedence, rest is trained

Input nodes ordered by frequency of being hit within a period of time

WHAT IS DIALOG MANAGEMENT?

- **Dialog manager (DM)** is the core component of any conversational system. It solicits input from the user (ASR+NLU, text, GUI), retrieves the content (DB, QA systems,) and decides on the best response to the user based on certain dialog strategy
- **4 key metrics** (need optimal mix of all)
 - Task completion rate (maximize)
 - Task completion time (minimize)
 - User perception/satisfaction (maximize)
 - User cognitive demand/load (minimize)
- **Directed-dialogs** used today
 - System completely controls the initiative (user just answers system's (simple) questions) to minimize impact of speech recognition errors
- **Mixed-initiative dialogs** are next generation
 - Both user and system can drive the dialog
 - User can provide complex, context dependent responses
 - Feels quite natural but has many challenges

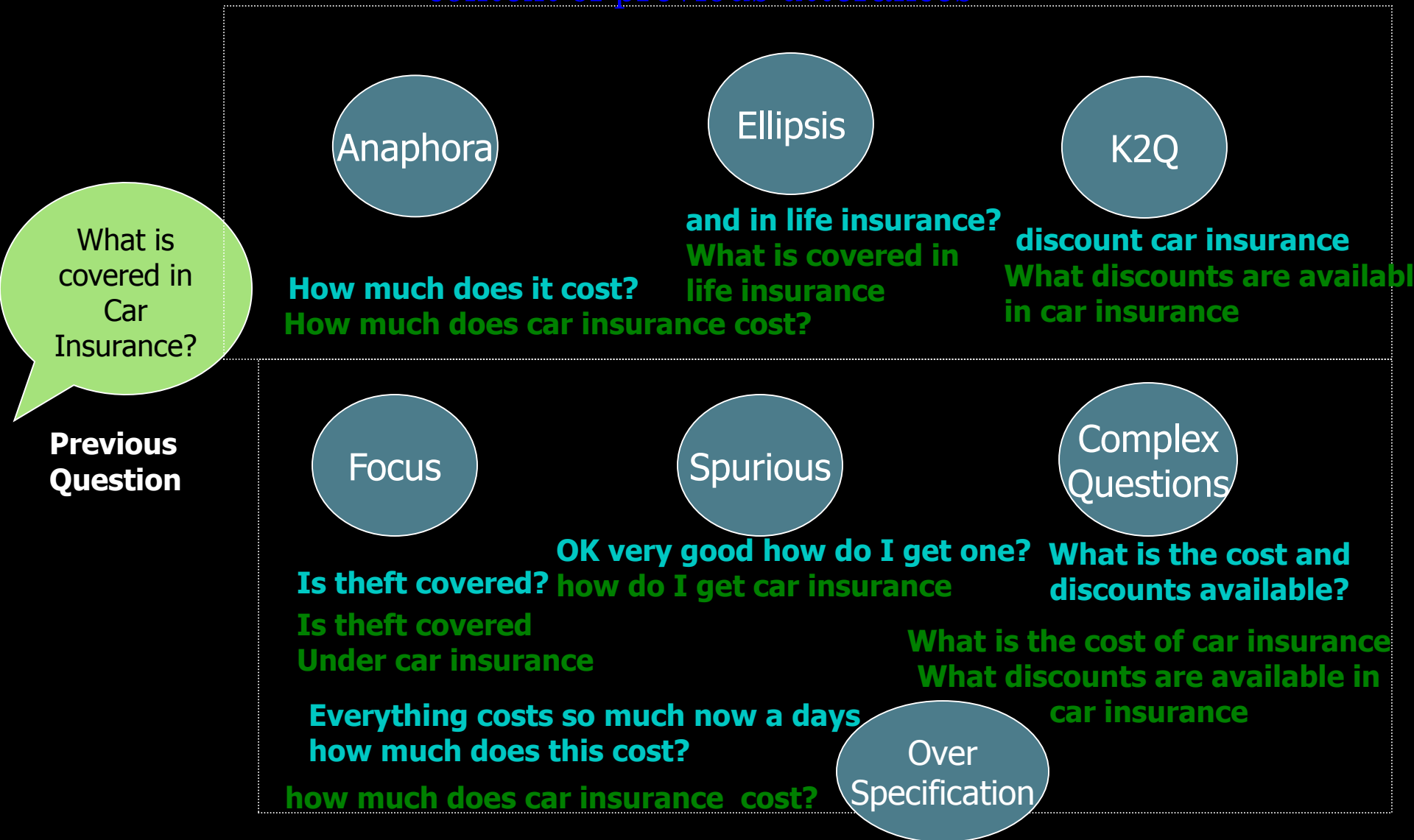


THE NEED OF DIALOG

- The desire of dialog management extend beyond information retrieval
- We see dialog as mean for interacting with all kinds of knowledge
 - databases, ontologies, knowledge graphs, unstructured data...
 - on desktops, tablets, phones, cars, robots, IOT...
 - affective, situated, multi-modal, multi-party, multi-app, cross-device, iot
 - various tasks
 - Persuasion
 - Diagnosis/remediation
 - Recommendation
 - Procedural (i.e. transactional) tasks
 - Tutoring
- New deployment models for dialog systems
 - New ways of integrating dialog management with existing applications
 - Entirely new kinds of dialog-based applications
- We work towards a flexible general purpose dialog system for the Watson family of products and services

DIALOG IN CONTEXT

In conversations isolated utterances need to be “interpreted” in the context of previous utterances



Watson Dialog API

The WCDS API is a HTTP API that allows another system to make requests to applications configured on a WCDS instance.

Content : Upload, Update, or Delete existing dialog content

[Show/Hide](#) | [List Operations](#) | [Expand Operations](#)

PUT	/dialogs/{dialog_id}/content	Used to update content for specified nodes.
GET	/dialogs/{dialog_id}/content	Get content for all Input and Output nodes.
POST	/dialogs	The dialog_id returned is used for subsequent calls to the API
GET	/dialogs	Provides a list of Dialog applications associated with a service instance.
DELETE	/dialogs	Used to close entire Dialog instance. This permanently removes all associated data.
PUT	/dialogs/{dialog_id}	Upload an existing dialog file to the system.
DELETE	/dialogs/{dialog_id}	Close an existing dialog file. This permanently removes all associated data.

Conversation : Start new conversations, Obtain responses, Find Session Data

[Show/Hide](#) | [List Operations](#) | [Expand Operations](#)

POST	/dialogs/{dialog_id}/conversation	Used to obtain a response from the system for a submitted input message. Also used to start new conversations.
GET	/dialogs/{dialog_id}/conversation	Used to obtain chat session data dump for a given date.

Profile : Get or Set profile variables

[Show/Hide](#) | [List Operations](#) | [Expand Operations](#)

PUT	/dialogs/{dialog_id}/profile	Set the values for profile variables.
GET	/dialogs/{dialog_id}/profile	Get the values for profile variables for a given client id.

WHAT'S IN THEATERS

What can I call you?

Tomas

Chat


WHAT'S IN THEATERS 

0
Favorites

Tomas 




Dear Tomas! Would you like to find a movie that's now playing or coming soon?

Movie now playing please 



Are you in the mood for a specific genre?

comedy, some nice comedy 












Do you prefer a certain movie rating?

yes 



Which one?

R

 .gitignore	initial commit	2 months ago
 .jshintignore	initial commit	2 months ago
 .jshintrc	initial commit	2 months ago
 CONTRIBUTING.md	initial commit	2 months ago
 LICENSE	initial commit	2 months ago
 README.md	Update README.md	24 days ago
 app.js	add beta service	26 days ago
 manifest.yml	Update manifest.yml	6 days ago
 package.json	initial commit	2 months ago

You can clone with [HTTPS](#), [SSH](#), or [Subversion](#).

Clone in Desktop

Download ZIP

README.md

Dialog Tool

The Dialog Tool enables you to create, manage, and interact with dialogs for the IBM Watson [Dialog service](#).

Give it a try! Click the button below to fork into IBM DevOps Services and deploy your own copy of this application on Bluemix.



Getting started

1. Create a Bluemix account. [Sign up](#) in Bluemix or use an existing account. Watson services in beta are free to use.



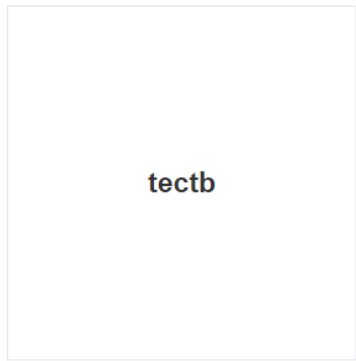
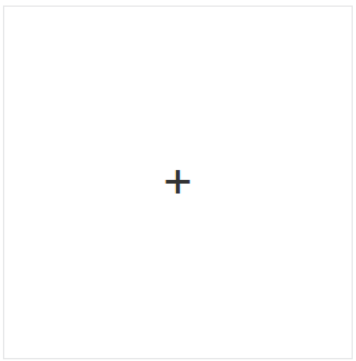
Dialog Tool

Tool to create, manage, and interact with dialogs for the IBM Watson Dialog Service

Resources:

- [API Overview](#)
- [Documentation](#)
- [Fork on Github](#)

Work with Dialogs



Have a conversation

Flow

Hello
How can I help you

Information

Dialog name: tectb
Dialog id: ef9c9fa0-d674-4b4d-a5fe-1276aa5d83d8
Conversation id: 14768
Client id: 16337

UI aspect

COGNITIVE AVATAR

Customer: Technology Exploration Center,
Software Group

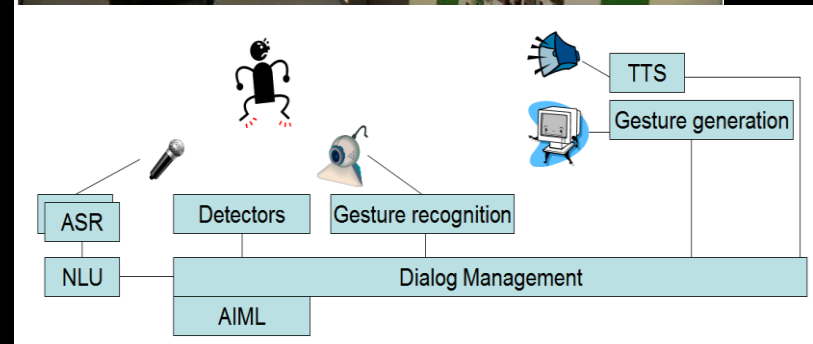
Description:

- Talking head with synchronized lips and numerous face expressions
- Body gesture recognition
 - User waves to get attention
 - User moves head forward to mute the system
- Implements six selected dialogue domains (small talk, weather, time, name days, local space navigation, education).
- WDS backend component permits fast authoring and maintenance
- Grammar + Remote dictation; Dictation + NLU
- Remote microphone, microphone array, techniques of opening microphone based on noise and state of dialogue
- Situation awareness (number of people and ambient noise level considered)
- Proactive attention request activities

(no people around) It is 12:00, time for lunch (shows menu on the screen)

(person passing by) Hi, do you know ..

(stops talking when no attention is drawn)



Hi, this is John

Hi John

What is the weather forecast

It is going to be sunny in low 30?

And next day?

It will rain Tomorrow.

Where can I find a rest room?

The rest room is at the end of the corridor,
do not forget your batch (shows location
on the screen)

http://www.ibm.com/cz/research_en/

THANK YOU!