

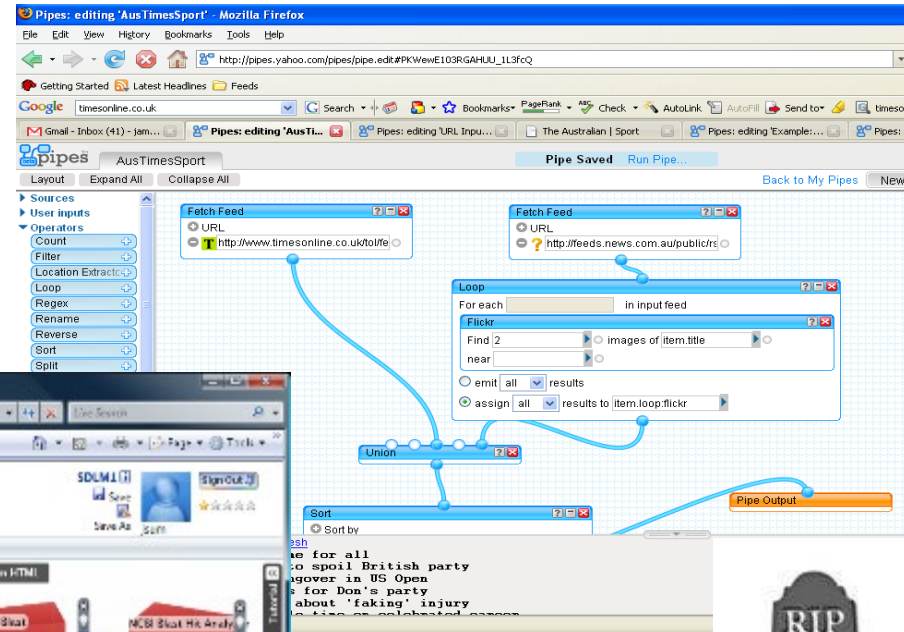
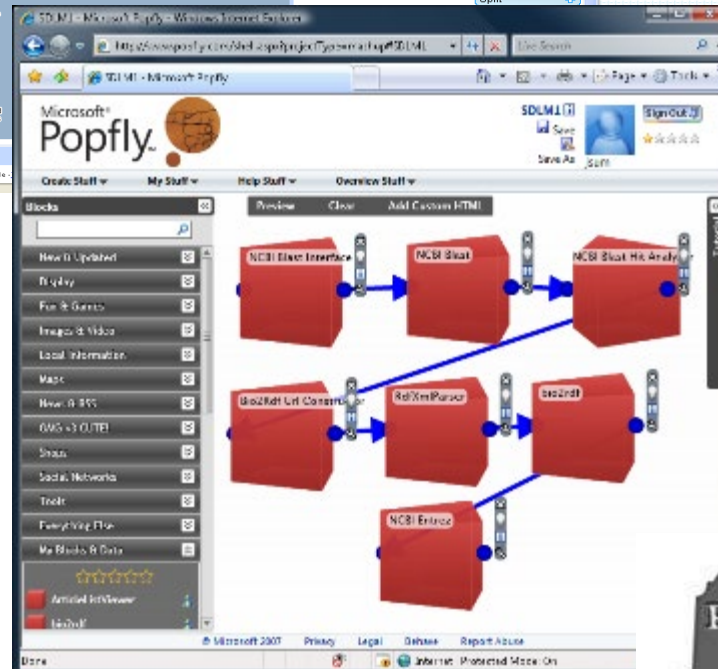
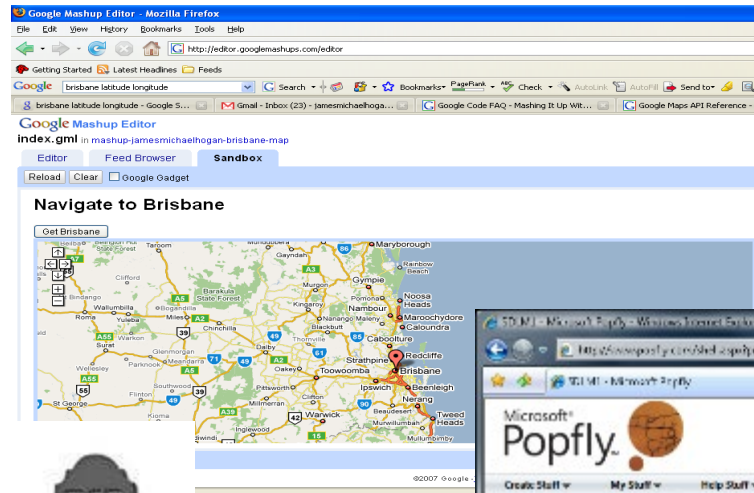
CAB432 Assignment 1

A Quick Overview

The basics

- **Mashups/Docker Assignment**
- **Release:** August 12 2022
- **Submission:** Monday, September 19 2022 (Week 9)
- **Weighting:** 30% of Unit Assessment
- **Task:** Individual Project

Mashups



The Basic Task

- Create a simple web application
 - A mashup of services and data (see the next slides)
 - Technically an extension of our prac exercises in weeks 4 and 5
- ‘Dockerise’ the app
 - Create a Docker container that hosts your app
 - Building on the prac over weeks 2 and 3
- Deploy to a public cloud
 - You ***must deploy using docker*** to get a good mark
- Implement a page view counter
 - You must use a cloud persistence service
- Show us that it works in a demo
 - Most of the marking will be face to face (subject to COVID restrictions)
 - The rest will be based on your code and report

The Mashup

- The application is a mashup of services or data
 - There must be at least two APIs involved
 - Mashup must be implemented (mainly) on the server
 - The client can be very simple – bootstrap with divs is normal
- The mashup has to ‘add value’
 - You need at least two use cases
 - You have to integrate the services
 - The user needs to get something more than just side by side results
 - Normally this means using results from one to query another

Example

- Suppose I have a favourite band – let's call them *The Band*
- I can search for musicians from the same genre
 - Artists like *The Band*
- I can search for their concerts
 - Upcoming concerts by *The Band*
- *The Band* is the query in each case

Example



Adding Value

The Band

Find artists like my favourite band

*The Other
Band*

*The Band
that is
better than
The Band*

*The New
Band*

*The Other
Band*

*The Band
that is
better than
The Band*

Find gigs by my favourite band

And gigs by artists *like* my favourite band

*The Band
Eaton's Hill
January 9*

*The Other
Band
Eaton's Hill
June 23*

*The New
Band*

The Band

*The Band
The Tivoli
February 8*

*The New
Band
The Tivoli
November 7*

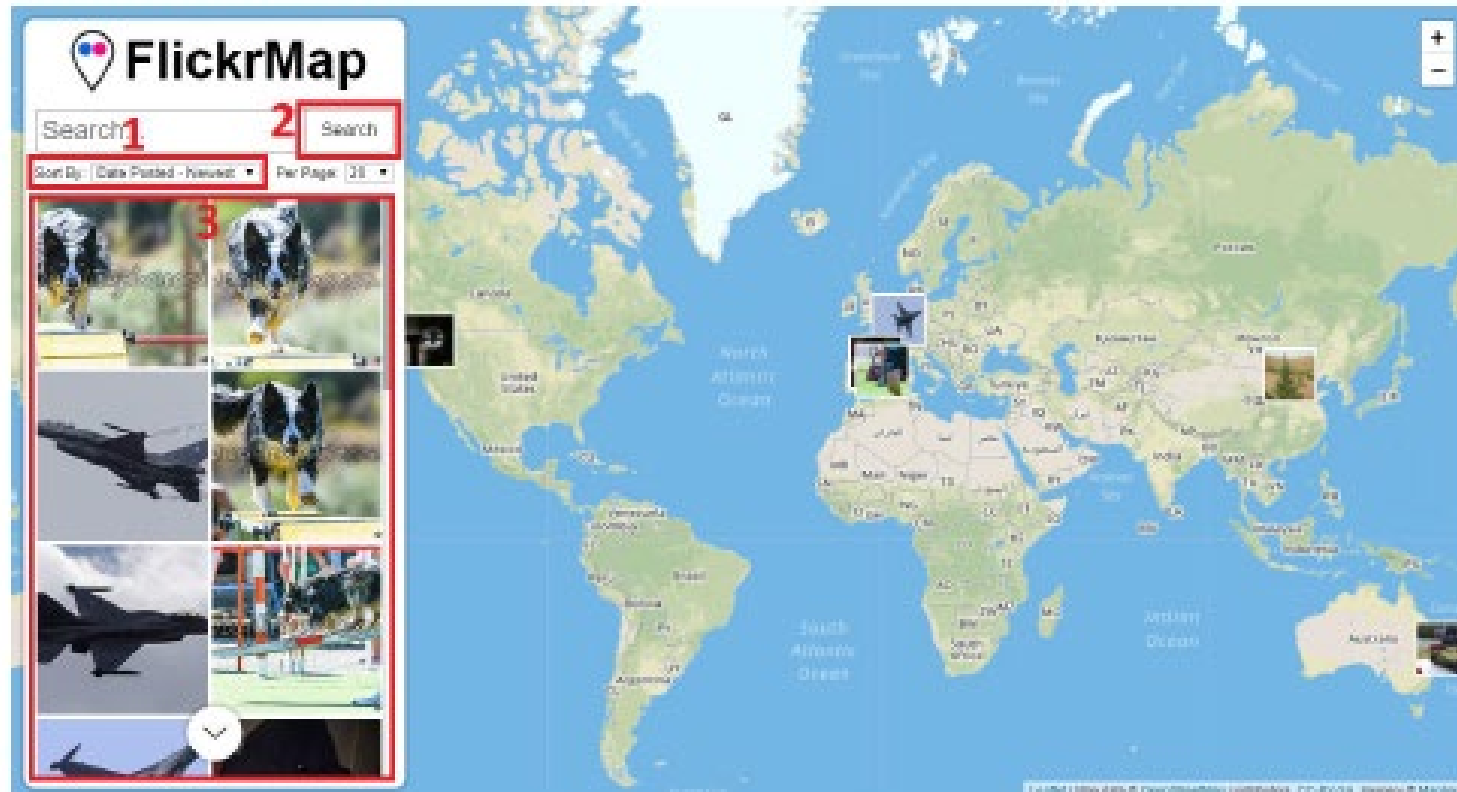
Example – FlickrMap (Jacob Marks)

- Flickr – photos
- Leaflet – interactive maps
- Google Cloud Vision API – labelling images

Example: FlickrMap

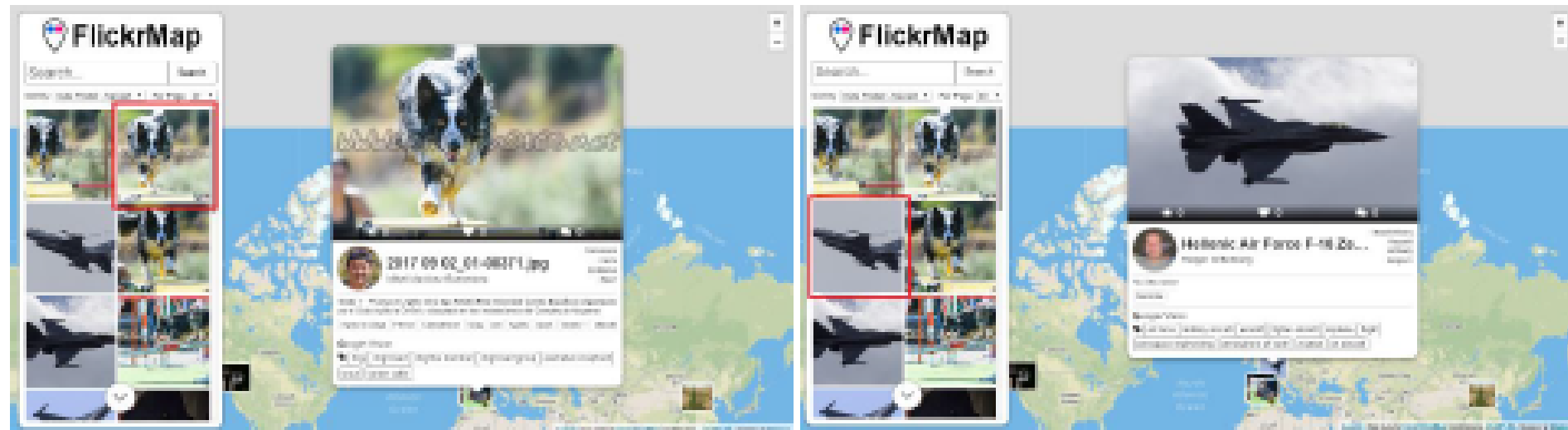
As a user, I want to search for recent photos, so that I can see what's happening around the world.

This user navigates to the index page of FlickrMap, with the intent to search for recent images they set the *Sort By* field to *Date Posted: Newest*, and then clicks on the *Search* button. They are then presented with the below results.



Example: FlickrMap

The user takes a closer look at two images by clicking on the results in the sidebar (shown below) and sees that there was a recent dog agility competition in Spain, and an F-16 flight demo in Belgium!



This use case utilises the follow services: Flickr API, Leaflet.