A bit about me

- Non-technical background.
- Editor and writer for *OS/2 Professional Magazine*.
- Set up community technology access centers.
- Generally area of interest is using technology to promote government transparency, increase civic participation and build social capital

. . . and a bit more

- Consultant for Rhode Island Department of State.
- 2003 appointed Chief Information Office for RI Department of State
- Four years at the helm of a large state agency, making decisions about systems that impacted state business, regulations and elections I learned the following . . .

Open Source +
Open Content +
Open Services
Open Government

Open Source & Government

- The freedom to run the program
- The freedom to study how the program works, and adapt it to your needs.
- The freedom to redistribute copies.
- The freedom to improve the program, and release your improvements to the public.

Philosophical Defense

- Tax payers pay for the software and, as such, they should have unfettered access to the source code.
- Transparency of process (e.g. voting equipment).
- greater access to government data and applications through shared source. (e.g. local governments should be sharing software with one another).

Practical Defense

- Open Source software makes great glue for joining disparate agencies' data together
  - many small tools chained together by open services
- Ability for agencies to co-develop and share results/ support
- Multiple support options are available to augment in house support
  - product support (MySQL, JBoss)
  - stack support (SpikeSource)
  - community support (Plone community sprints)

Staffing/Personnel

- Open source shops/departments foster a different environment and attract different admins/developers.
- Certifications carry less weight than the ability to find solutions in the community.
- Prerequisite here is that managers can identify that talent.

Diverse Ecosystem

- Open source prevents lock-in to a monolithic vendor
- More competition, better software and support

Open Content & Government

- Open Content: openly defined and described file format or date storage (e.g. Open Document Format)
- Enable access to the data independent of the application that created them
- Foster competition by encouraging multiple implementations

Open Document Format & Open Source

- Open source software and open content/ open specifications have always gone hand in hand
- open office and the open document format
  - koffice
  - open office
  - google docs
  - abiword
  - windows/mac/solaris

Open Content & Legislation

- Open content eliminates the tax on the citizen for viewing the content
- Open content helps insure longevity
- Government procurement specifications should mandate that, by default, content is stored in an open format.
- Legislation **should not** mandate a **standard** but rather **should** mandate **openness**

Open Content & G2G

- Government to Government (G2G) communication is facilitated by Open Content
- Emergency Preparedness - Lessons from Thailand

Open Content Saves Money

- Applications that work with open content can be changed swapped out.
- Leverage when dealing with proprietary vendors (MA, USA).

Open Services & Government

- Web services allow applications to communicate across platforms and programming languages using standard protocols based on XML. They are self-contained, self-describing, modular applications that can be published, located, and invoked across the Web. Web services perform functions, which can be anything from simple requests to complicated business processes...Once a Web service is deployed, other applications (and other Web services) can discover and invoke the deployed service. (From IBM and other web sources)

Open Services & Government

They are the tiny, open tools that tie together open content over open systems.

The Willis Doctrine:

- "It is simply unacceptable at this point in history that a citizen can use Web services to track the movies he is renting, the weather around his house and the books he's recently purchased, but cannot as easily monitor data regarding the quality of his drinking water, legislation or regulations that will directly impact his work or personal life, what contracts are currently available to bid on for his state, or what crimes have recently occurred on his street."

Open Services & The Citizen

- The Government Agency Homepage is Dead
- From the citizen's perspective, what government has that is valuable is **content**
- Government pages are a last resort for citizens
- Governments must adopt syndication services and make data available via ATOM or RSS.

Open Services & Alternative Views

- aggregation and recombining data can open up new routes to citizen engagement with government
  - chicagocrime.org (unfortunately) uses screen-scraping instead of services
  - (from about page): It is not an official source of crime information for the city of Chicago. Rather, it is an **alternative view of public record** that is available elsewhere.

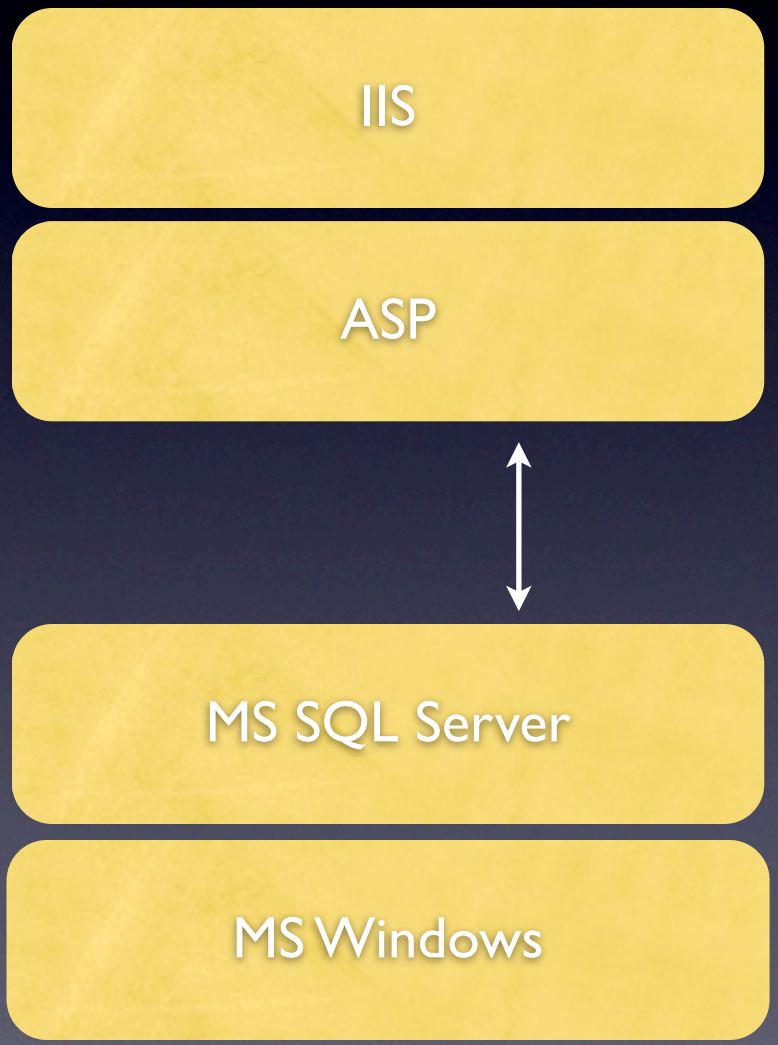
Open Source and Open Services

- Open source software projects have been built from the premise of small tools chained together.
- Web 2.0 is a natural extension of bash, awk, sed and grep
- open source products don't need to rewritten to speak open services the way that many proprietary products do

Easing the transition to Open Source

- Changing the tire of a moving car
- Open Services also provide a scaffolding for agencies to migrate from proprietary services to open source on-the-fly

Example Migration Scenario



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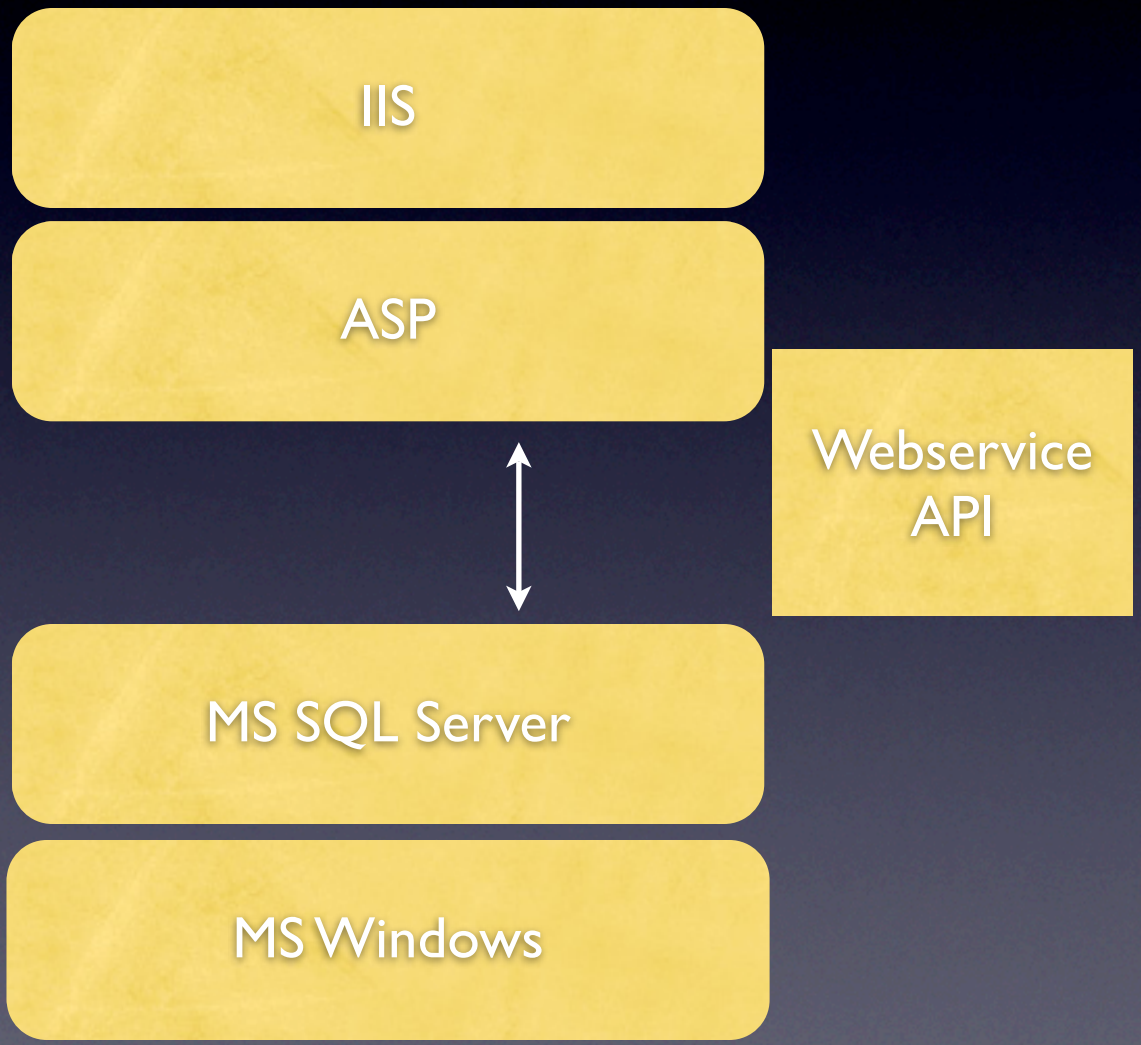

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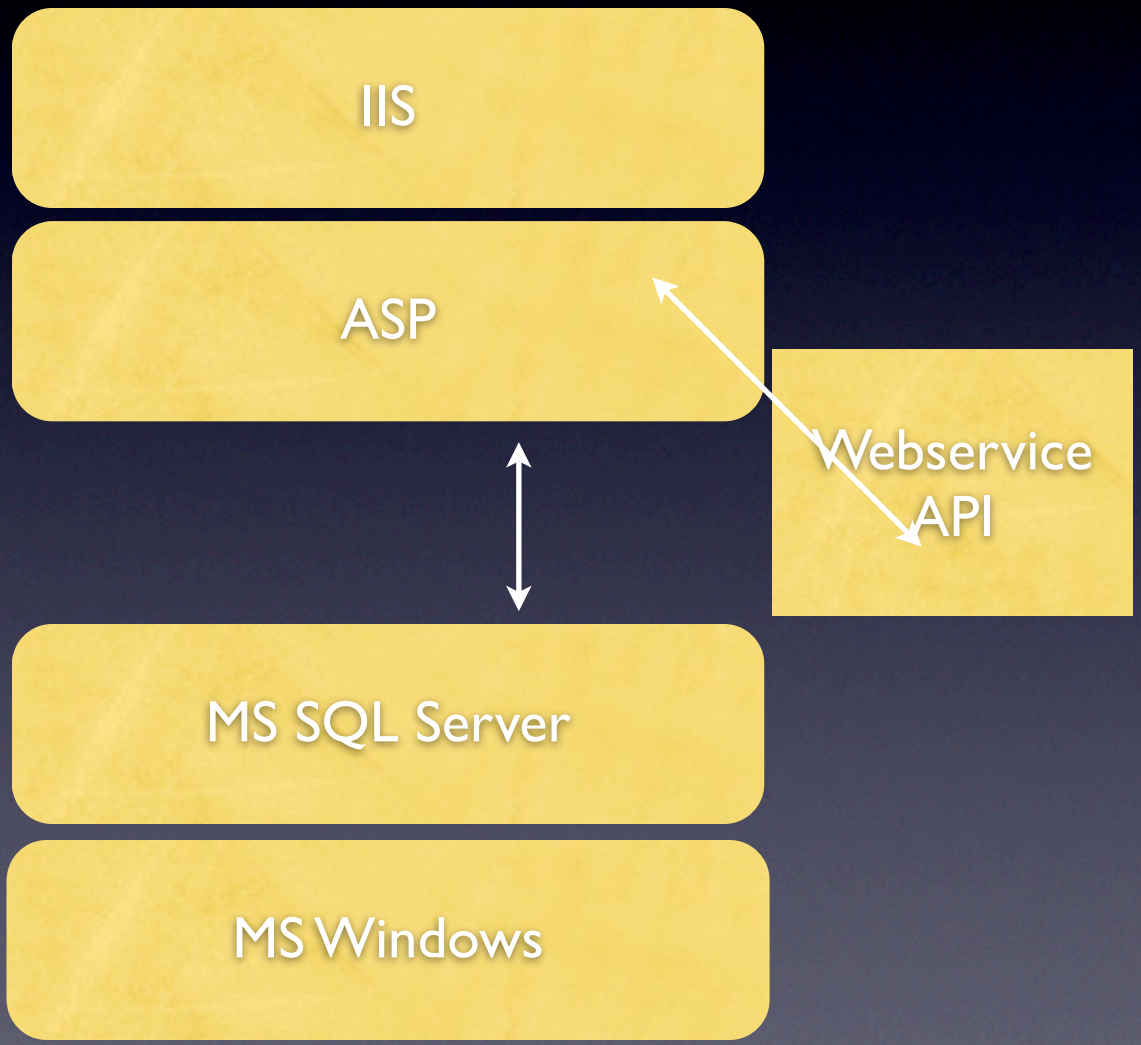

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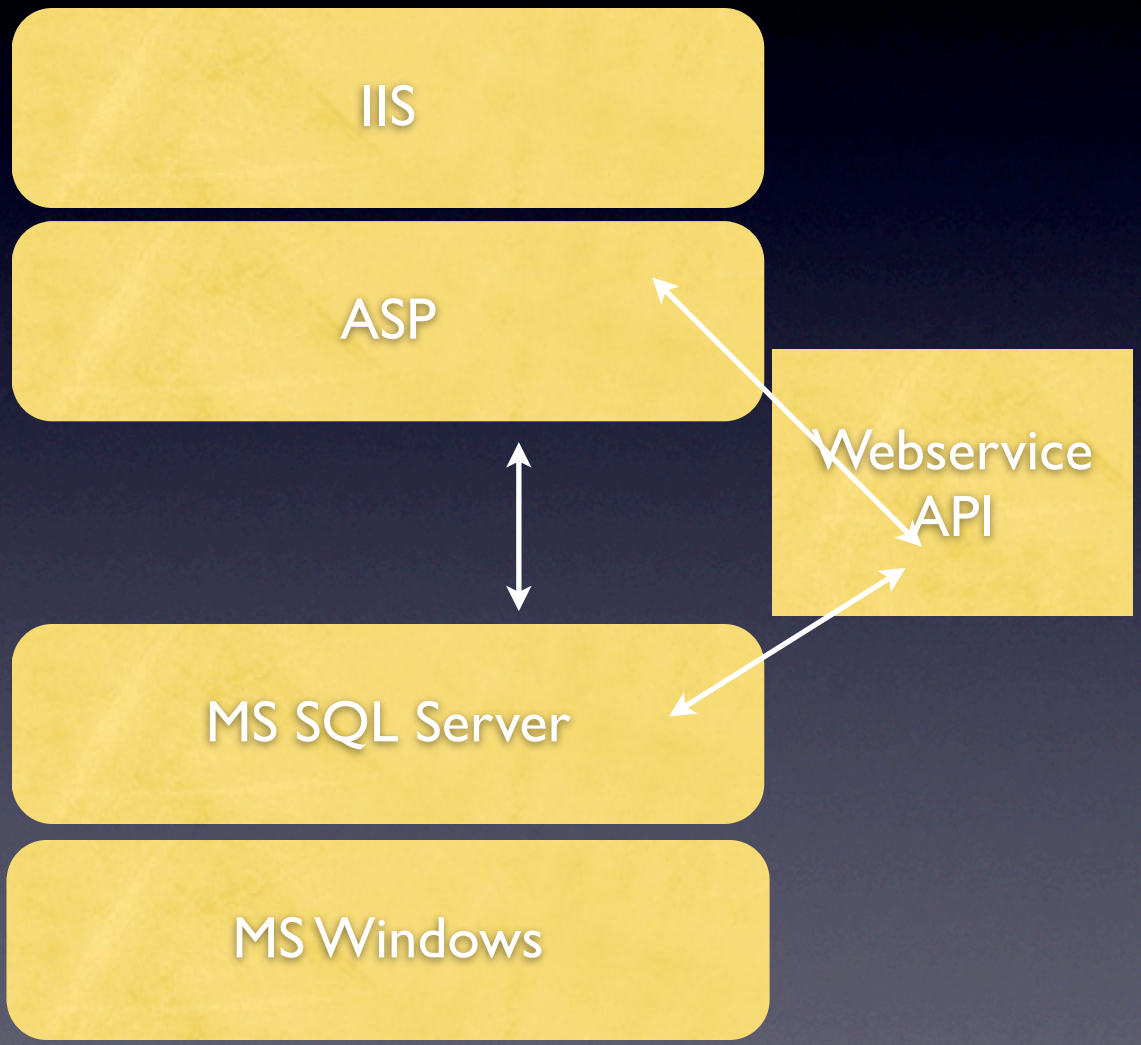

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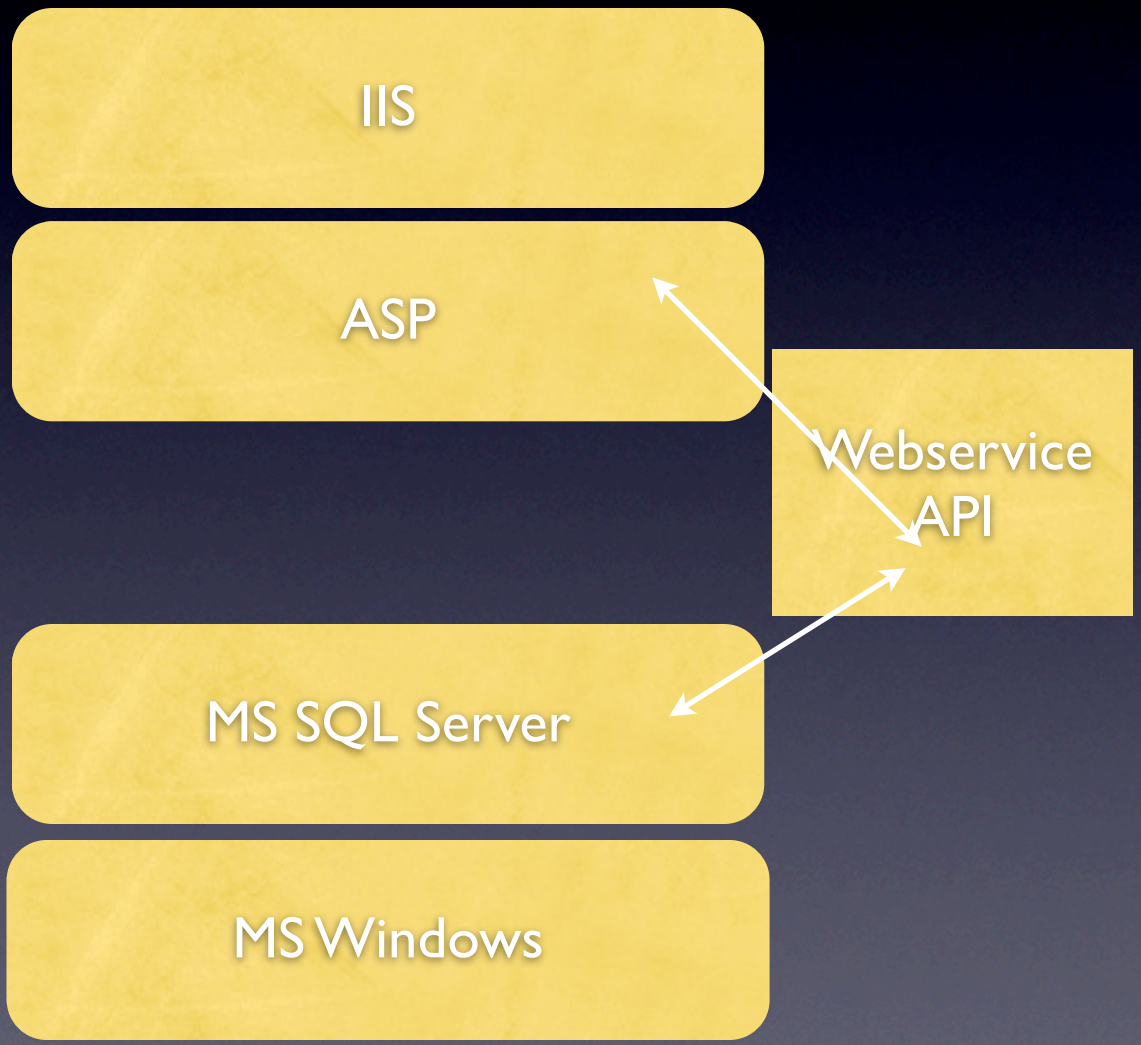

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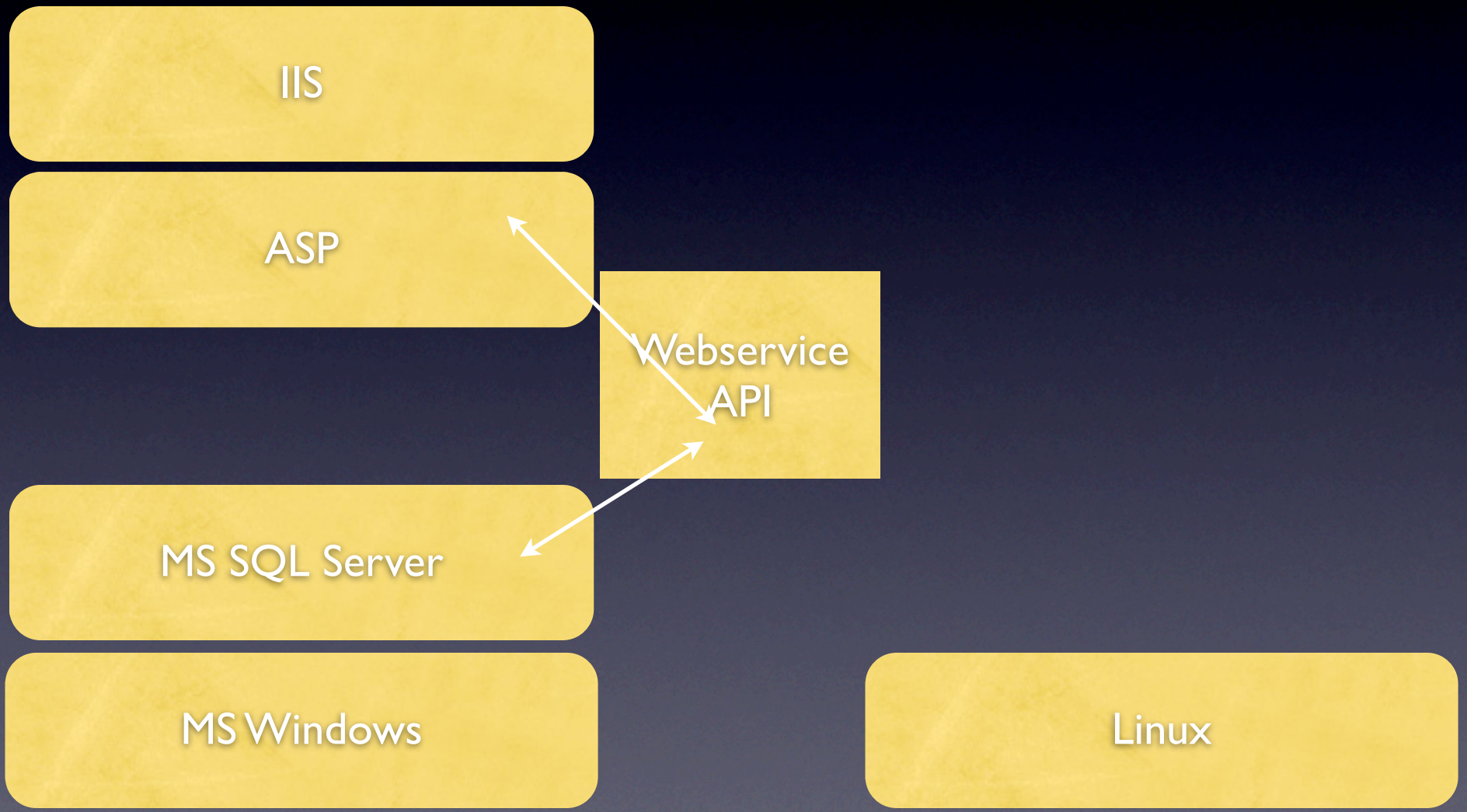

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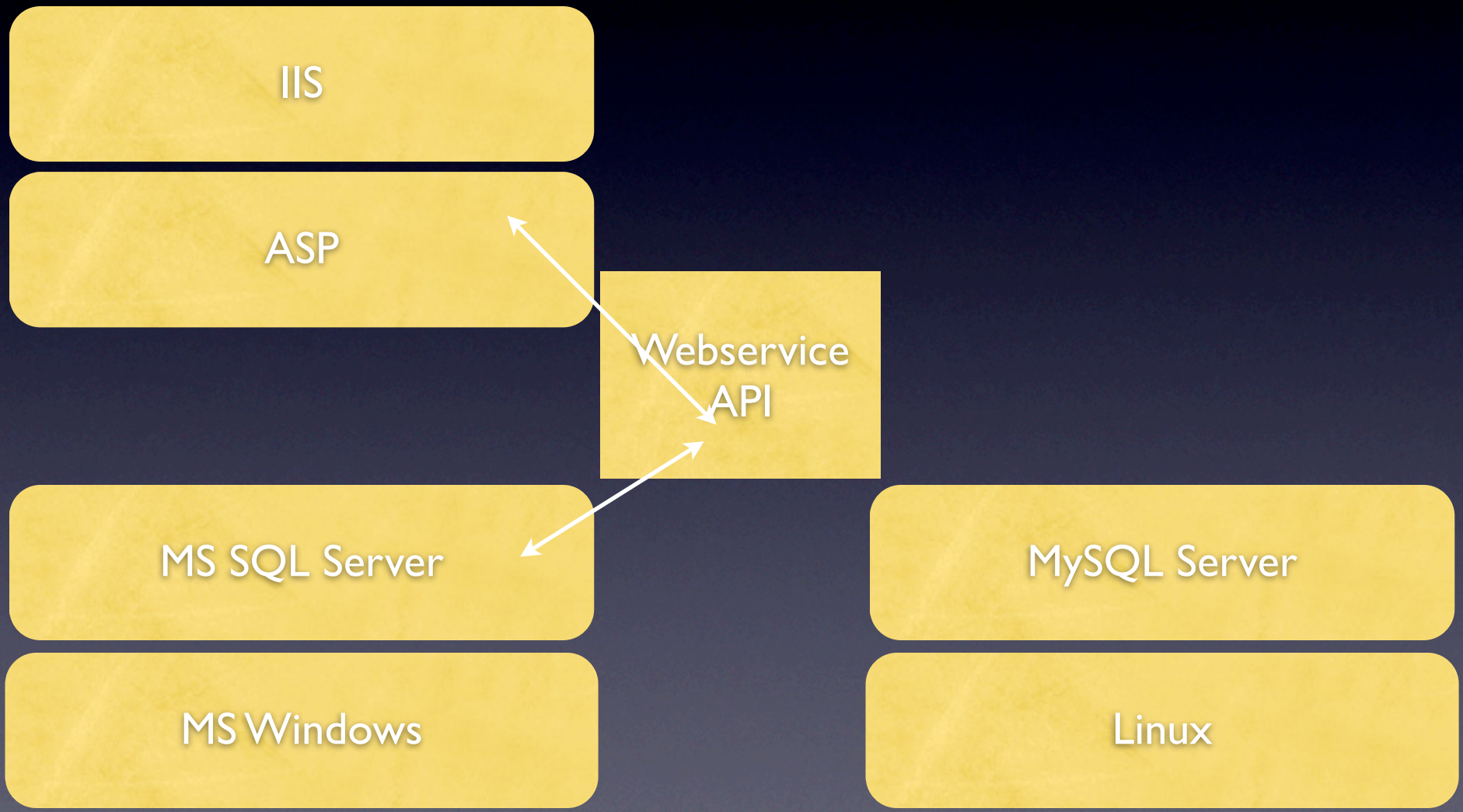

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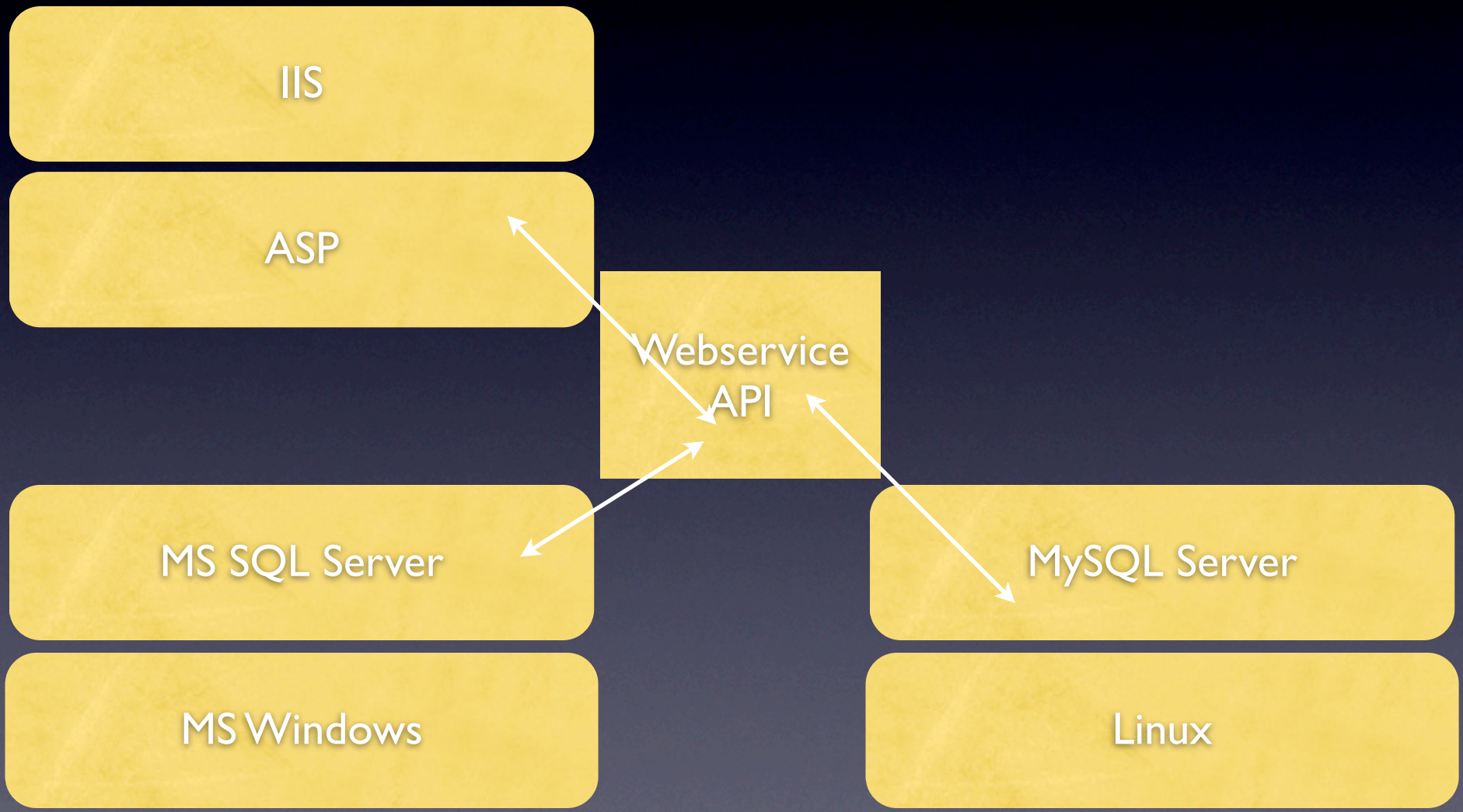

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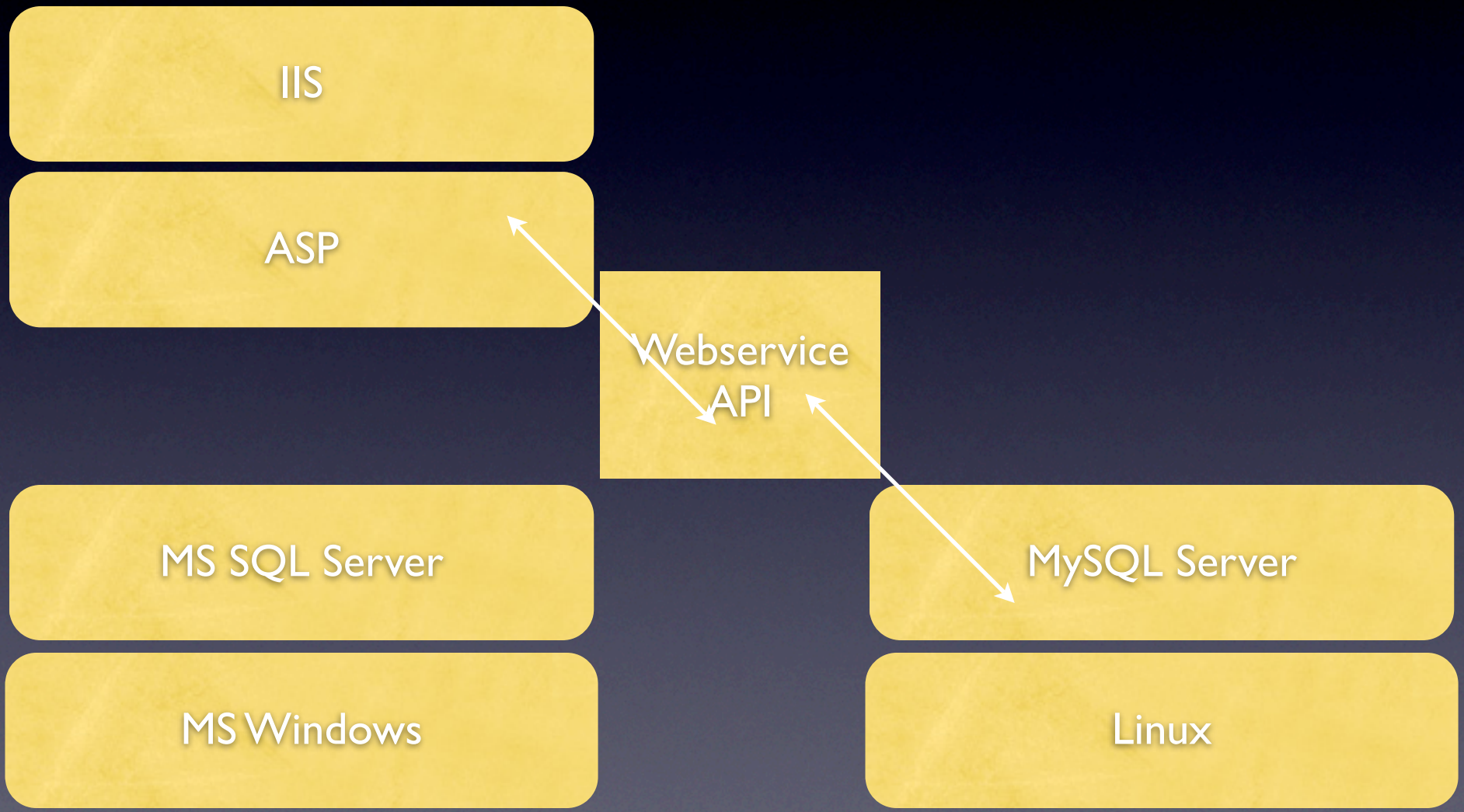

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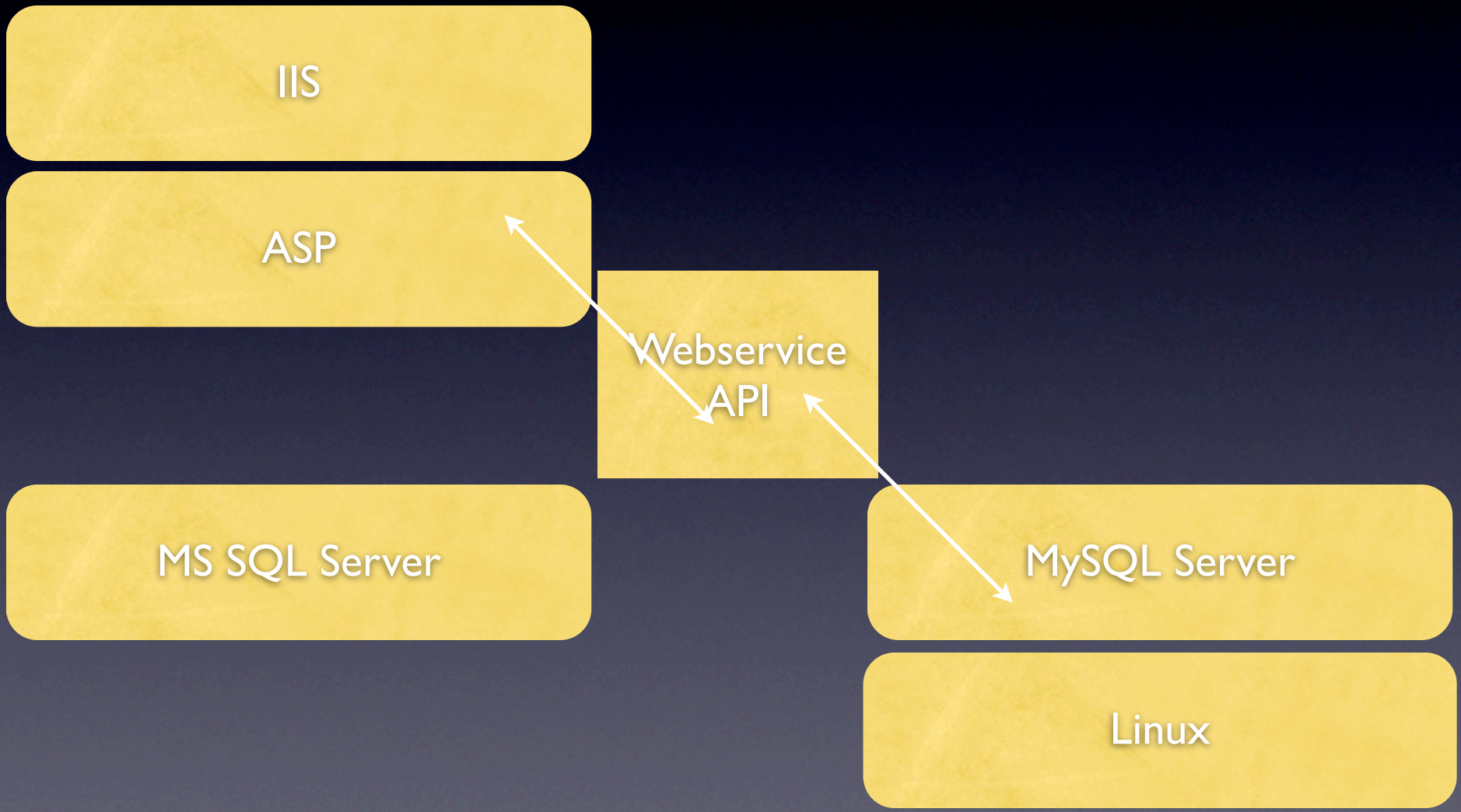

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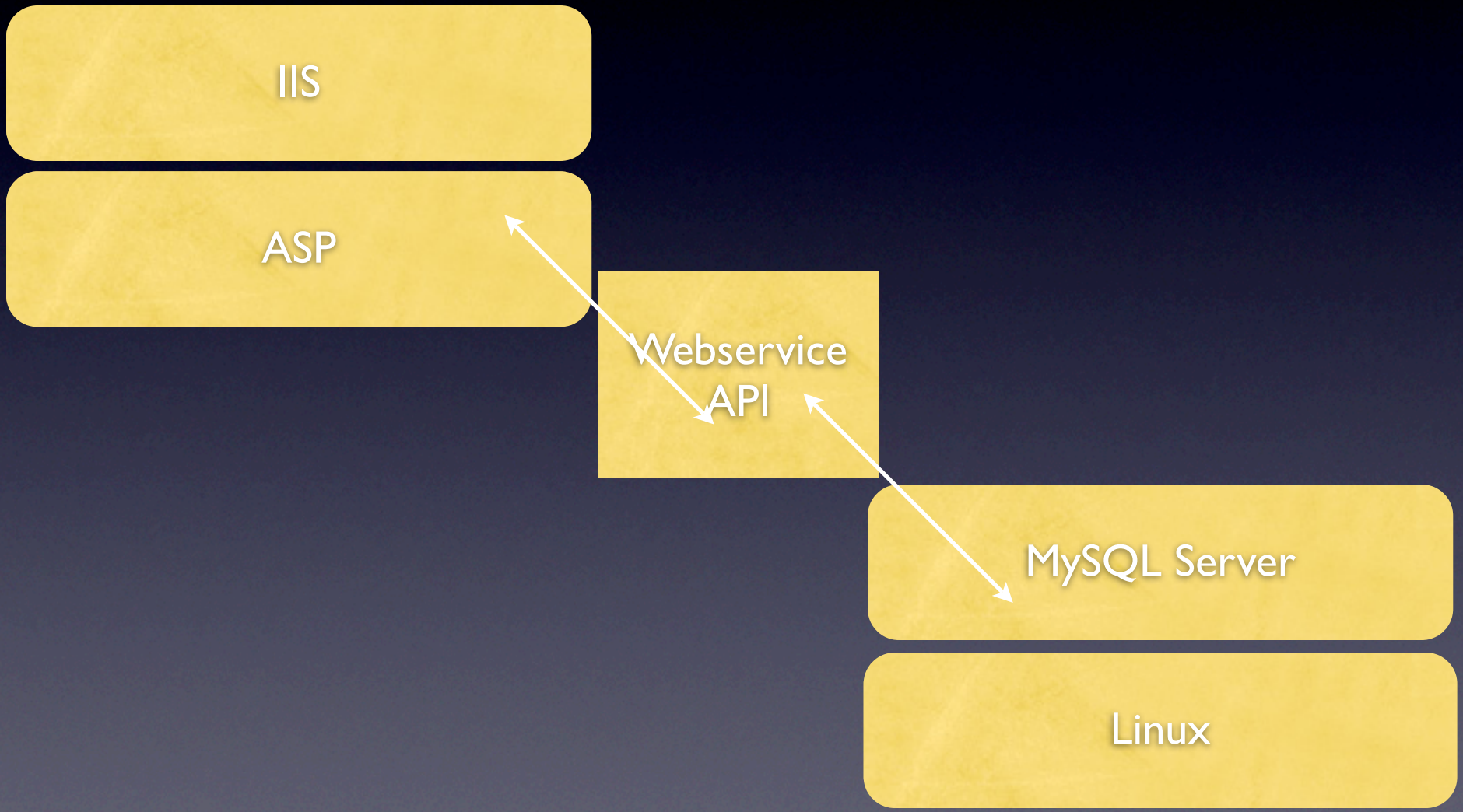

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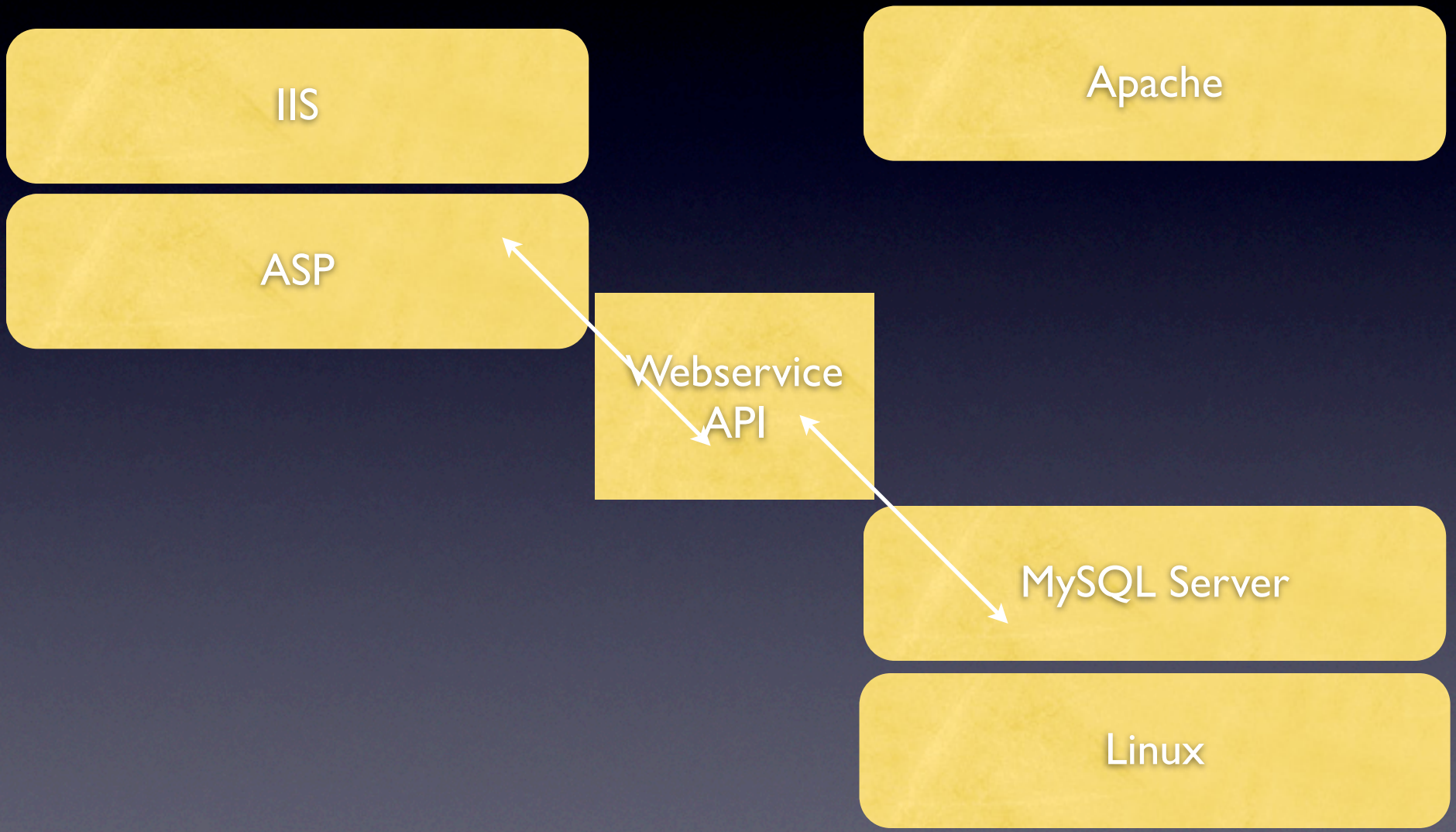

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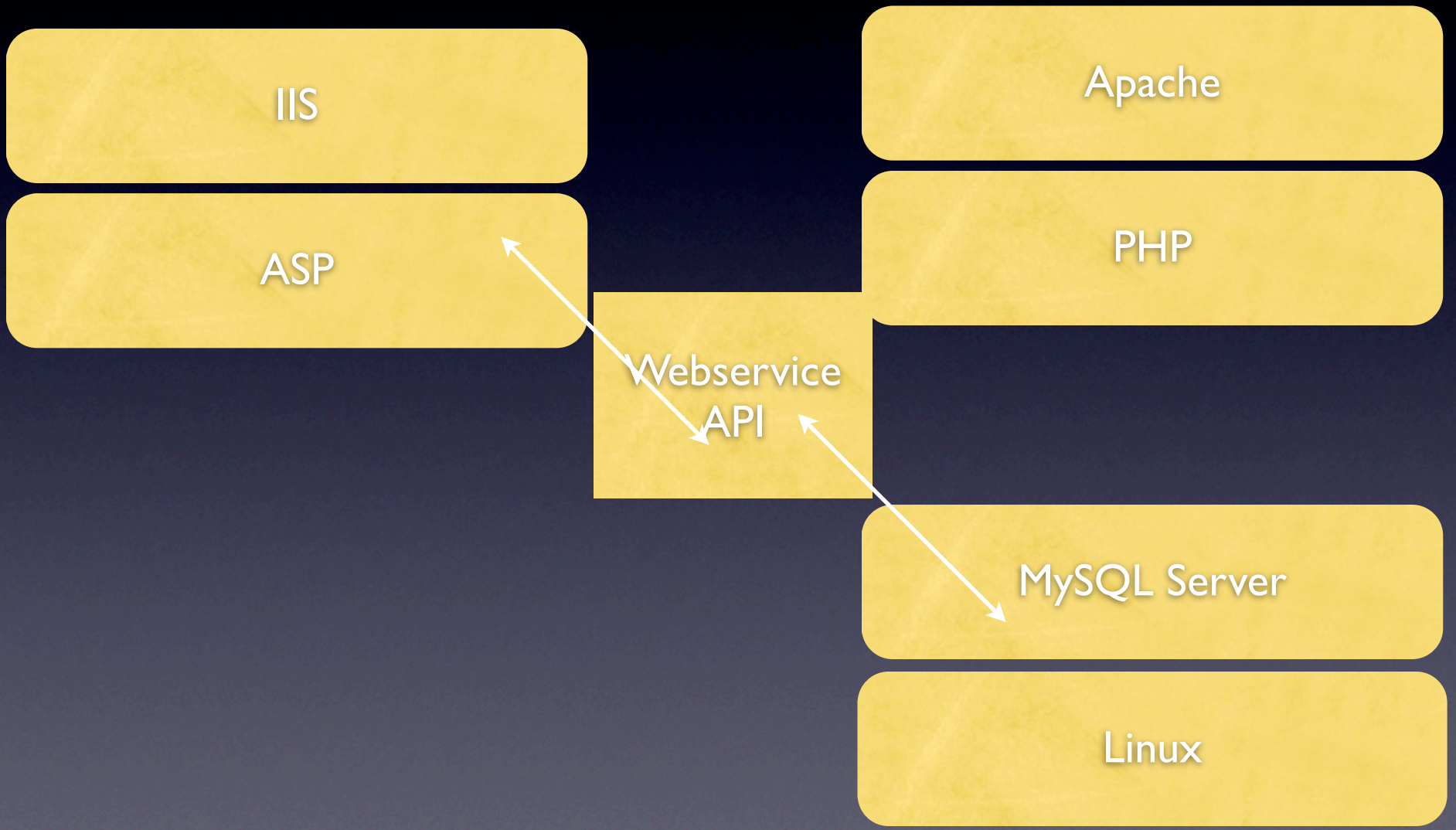

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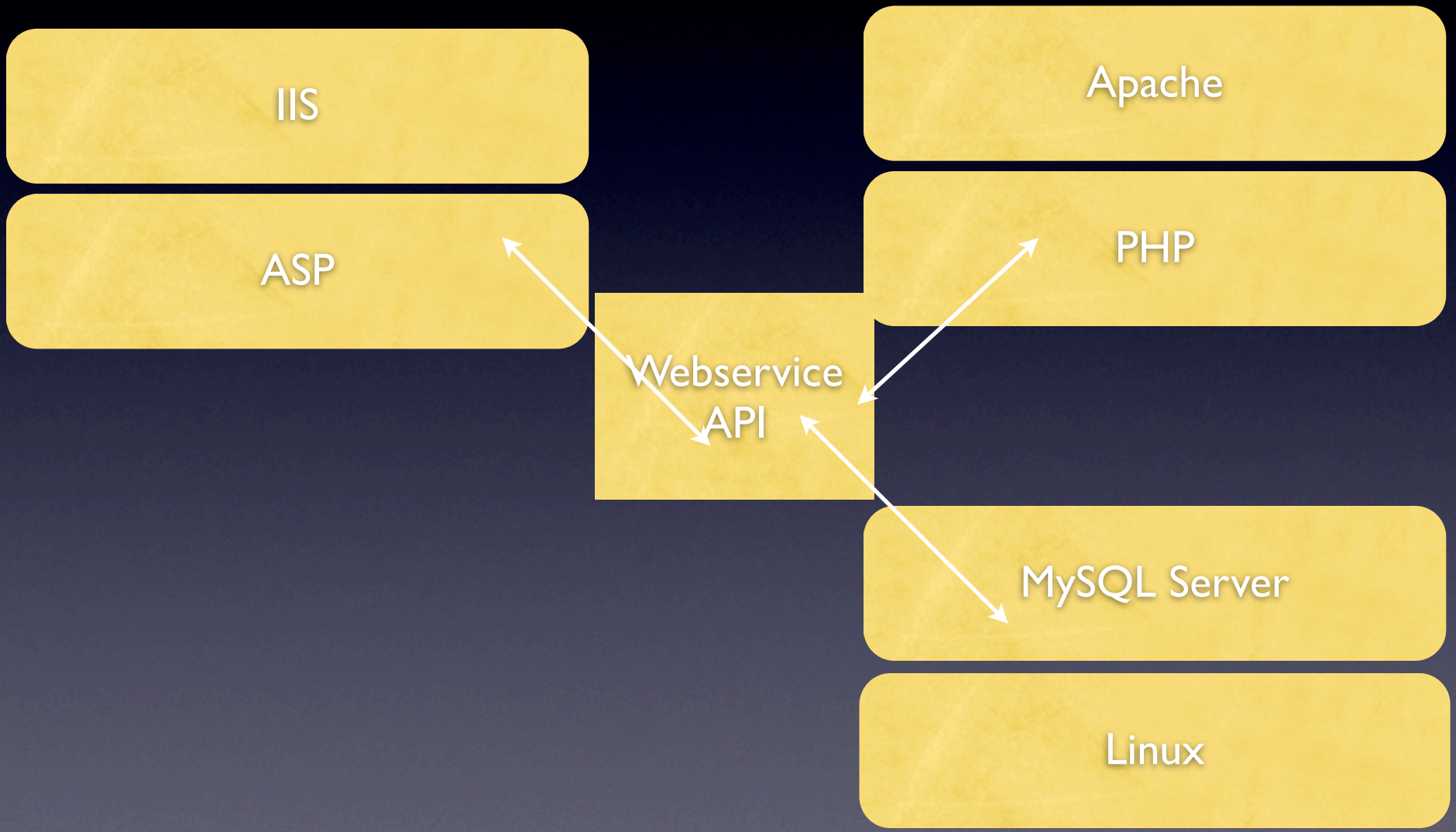

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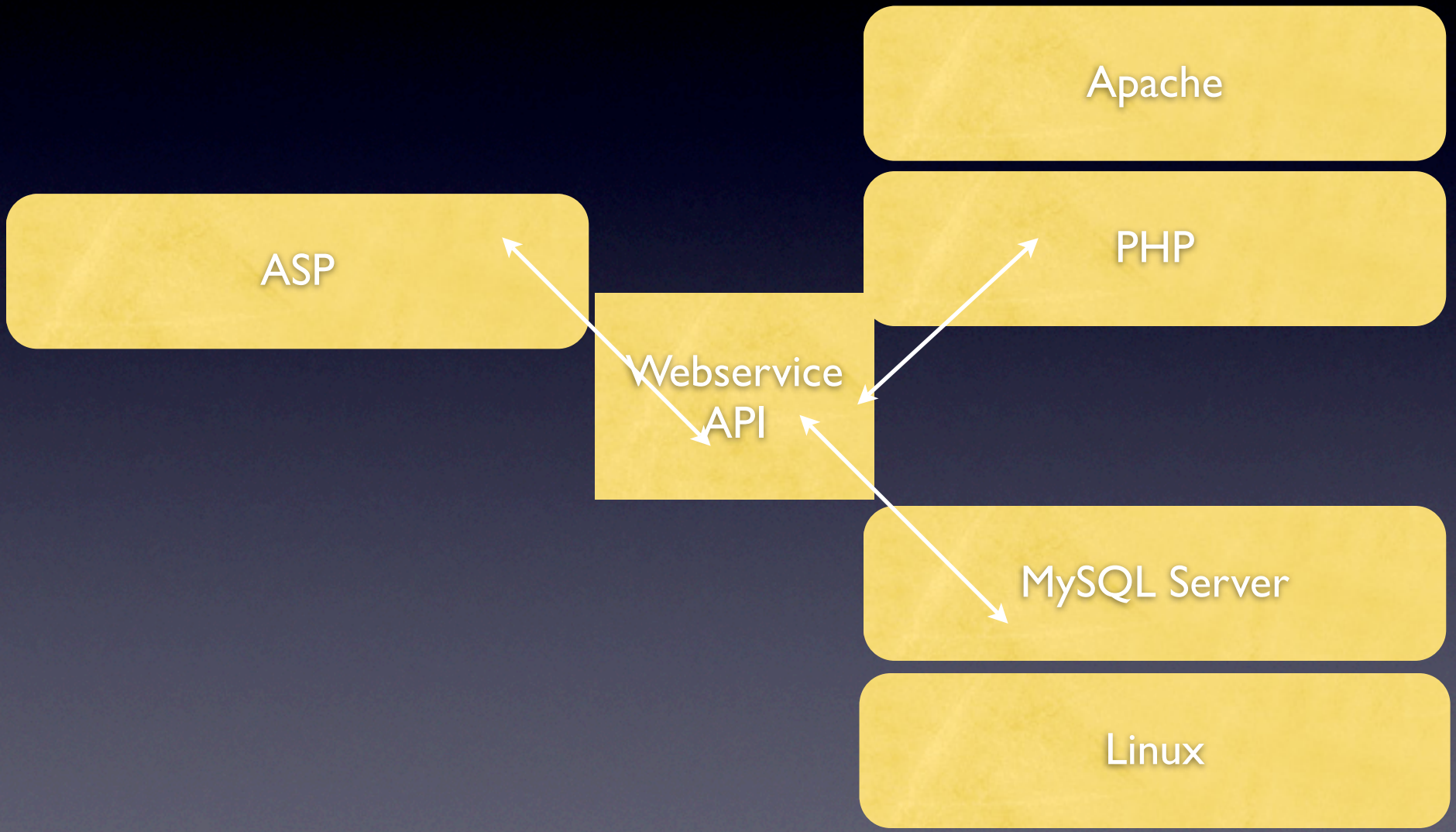

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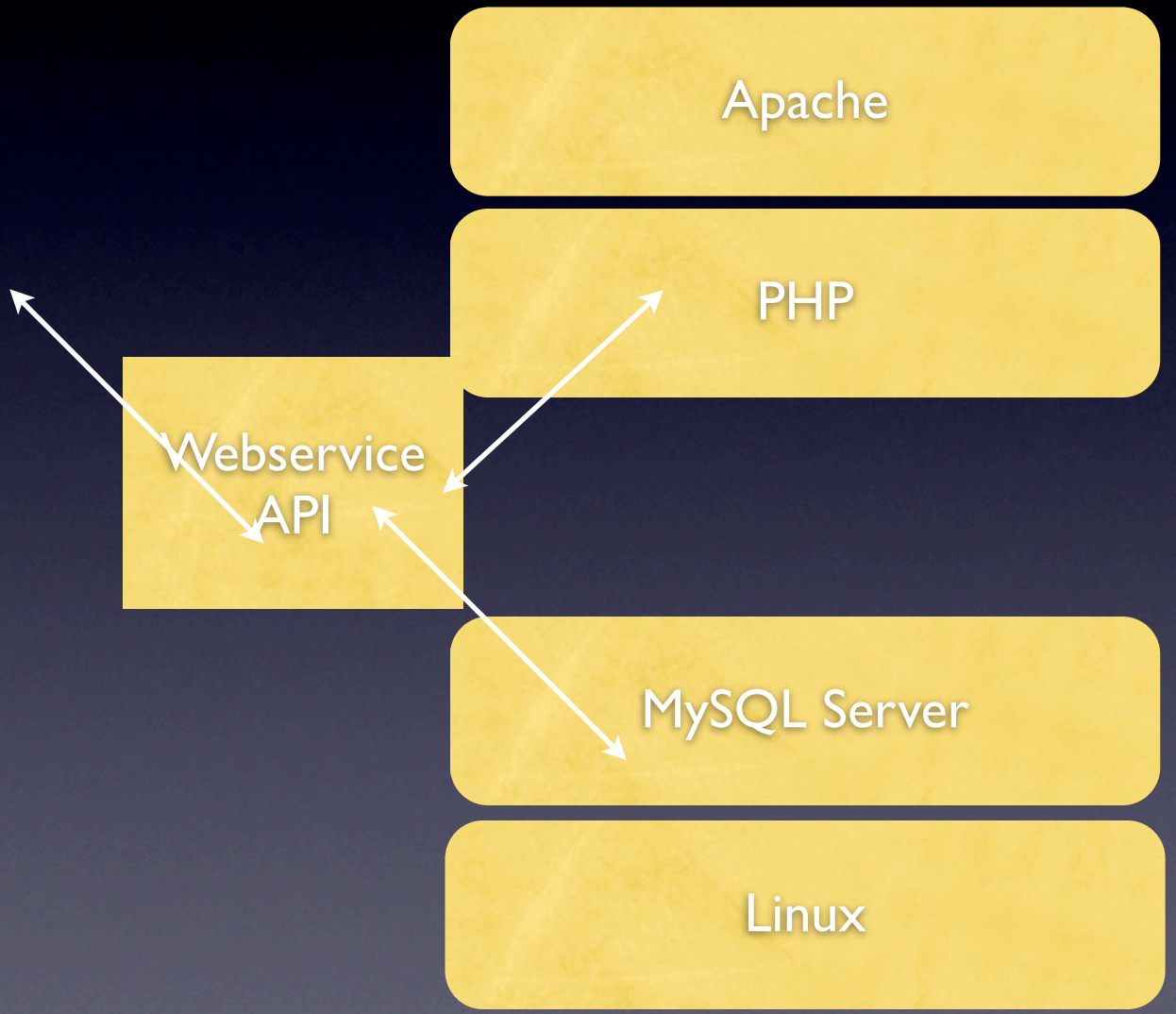

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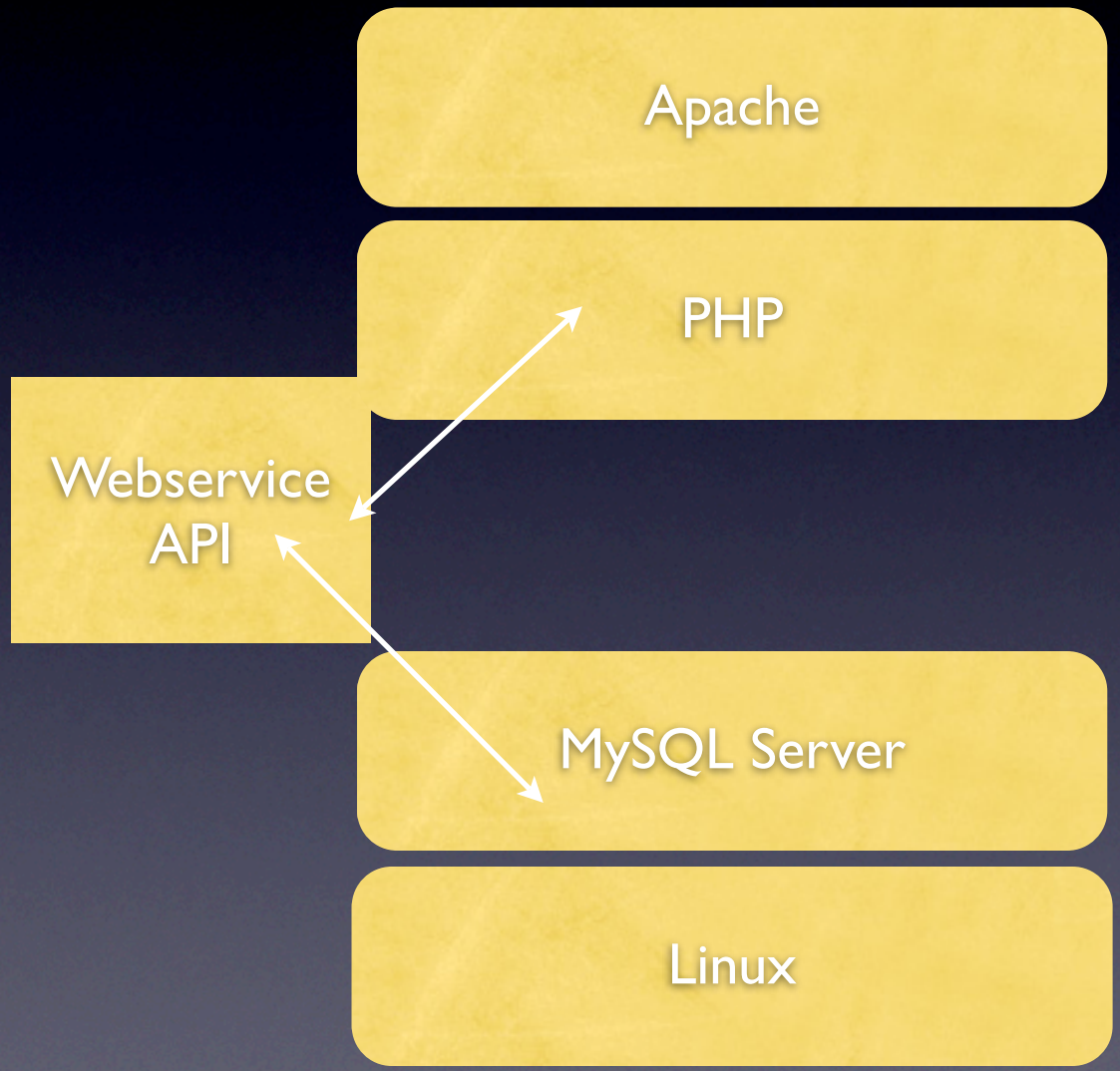

Next Steps

- What's really needed (desperately) on the open source side is some way to measure and quantify cost savings vs. proprietary solutions
- Greater sharing of software among government entities

Small Steps

- RSS is a great way to introduce people to open services
- while RSS has been a great way to syndicate some data types the ical spec needs to really improve.
- the combo of RSS and iCal will drive participatory democracy

Leadership/Management needs to catch up

- Government needs to get out of the business of trying to predict the applications that citizens want
- Needs to focus on opening up the widest possible spectrum of services

Hiring practices need to change

- Hire good problems solvers
- If they're bright and passionate, even if they've had limited exposure to free software, they'll come around:

Inside the head of an MSCE

- G.C. A+, CNA, MCP, MCSA, MCSE
- I have worked with closed source software for most of my professional career. The majority of it Microsoft based. From my experience, the industry standard has been to find the biggest name brand option, find other similar options, compare features and prices and make a decision... Through my research I would always come across an open source option that was enticing due to the fact that there were no licensing fees, making it a very inexpensive option. The main issues that always seemed to eliminate it from being an option had to do with finding mainstream support for the software and having the expertise in-house to be able to just install it.
- Over the last two years I was given an opportunity to work for an IT shop that chose an open source direction. I took it as a great learning experience and it forever changed my views of information technology. I worked on many projects based on open source software specifically in the research and development area. Though I did not have a manual to refer to or a phone number to call for support, I quickly found that all the help I needed and questions I had were just an Internet search away. As an added bonus I found that disaster recovery and documentation, something that had always been difficult to stay on top of [in an MS environment], was much easier to maintain. Most configuration specific information in the Linux world is found in a text file making both disaster recovery and documentation much easier.

Get Involved

- Government leaders need input from smart, articulate citizens who understand issues around openness.