

# ***WAP Forum***

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Press Briefing  
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# Agenda

- **Welcome and introductions**
- **WAP Process and Forum**
- **Technology Overview**
- **Discussion**

# Objectives of WAP Forum

- **Bring Internet content and advanced services to digital cellular phones and other wireless terminals**
- **Create a global wireless protocol specification to work across differing wireless network technologies**
- **Submit specifications for adoption by appropriate industry and standards bodies**
- **Enable applications to scale across a variety of transport options and device types**

# WAP history & future schedule

- 26 Jun** WAP effort launched by founders
- 15 Sep** WAP architecture published
- 07 Jan** WAP Forum open for new members
- 30 Jan** Draft spec available for members to review
- 12 Feb** Public briefing meeting
- 13 Feb** Members' technical briefing
- 17 Feb** Announce specifications open to public
- 12 Mar** Members review and briefing meeting
- 30 Apr** Target for WAP specifications v1.0
- May** New working groups created for future evolution

# The Business Problem

**There must be one global wireless network language and protocol stack**

- Internet developers will only write to one global wireless Internet.
- carriers require multiple sources for compatible handsets.
- handset vendors require common standards for economies of scale.

*Incompatible solutions stall the market*

# Problem for advanced services

Need to reach many subscribers with service

**Problem for advanced services**

Multiple terminal types, all different

Don't want to risk network investment for one special device - it may not be successful

All terminals support SMS + voice - use only these

Potential of smart devices never realized. Users have no reason to buy smart devices

Services stay difficult to use, and have basic functions only

Services growth stuck in *"lowest common denominator trap"*

# Operator requirements

## Multi-vendor interoperability

- need to offer brand choice to end-customers
- all phones work with all servers

## Scaleable solution

- reach many users without being limited by the lowest common denominator
- single server optimizes end-user experience to best capabilities of phone
- display scalability - from one line up to smart phone class
- bearer scalability SMS to circuit or packet
- future-proof, investment protection



# **Solution - scalable service design using WAP**

- **Flexible use of multiple network elements**
- **Provide better service functionality and ease-of-use to best capabilities of each terminal**
- **Allows each device to optimize the proposition**
- **Single marketing story for service offering**
- **Attract more subscribers - services can grow and develop**
- **Risk of backing wrong device minimized**

# End user requirements and corresponding benefits of WAP

## **Ease of use, easy to understand**

- vendor defined MMI
- optimized for long latencies & low bandwidth to minimize frustrating waiting time
- technical features hidden from end-user

## **Delivers value**

- wide range of services
- operator & manufacturer marketing and differentiation scope
- efficient use of airtime

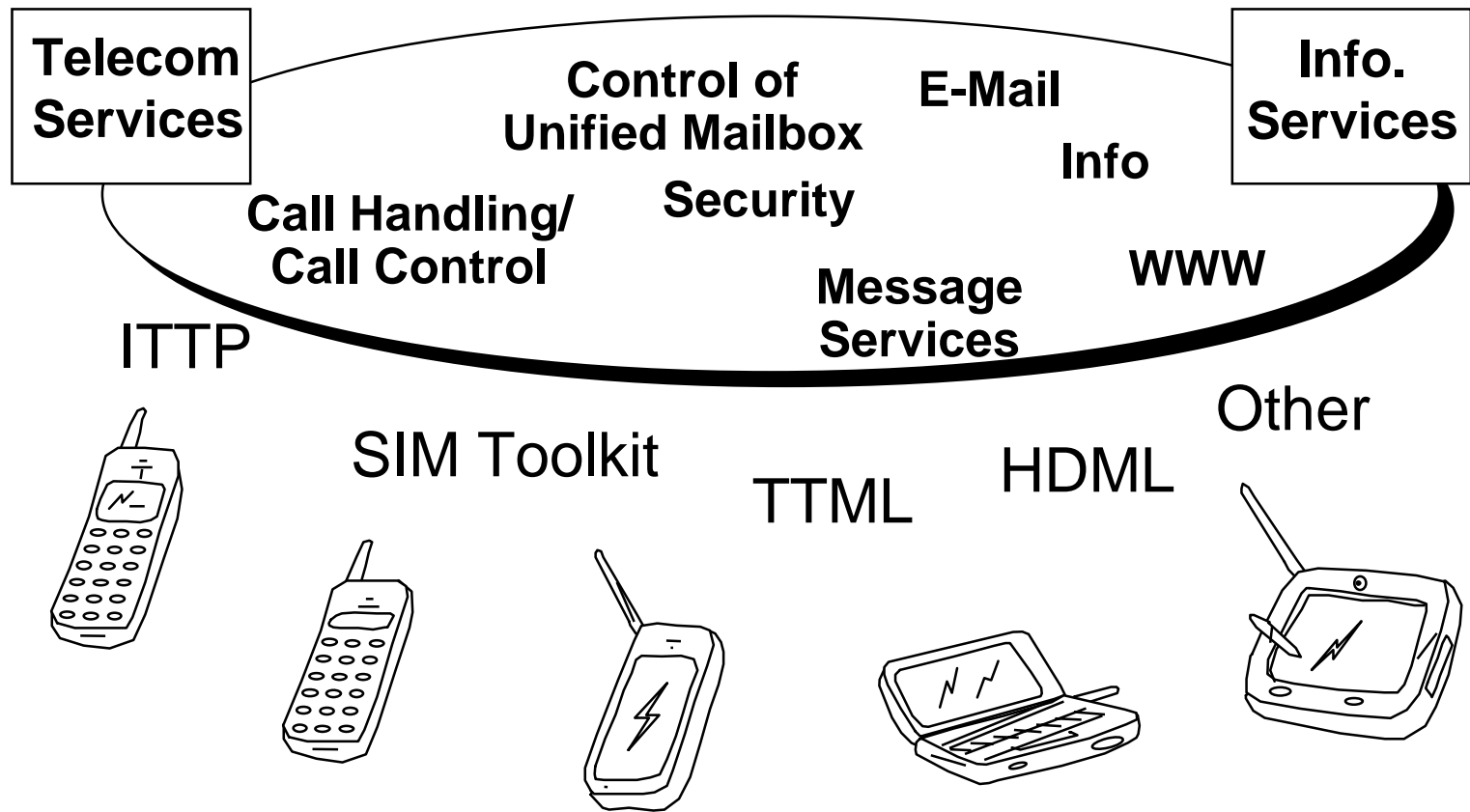
## **Reduce / eliminate changeover cost**

- same WAP applications run on future bearers and devices

# Latest Developments

- **Specs on Web site for Public comment**
  - [www.wapforum.org](http://www.wapforum.org)
- **London briefing for new & prospective members**
  - over 130 attendees representing over 60 companies
- **Companies have joined**
  - operators, manufacturers, software companies, etc.
- **Next member briefing in Miami March 12 & 13**

# Service Development - Concept Overview

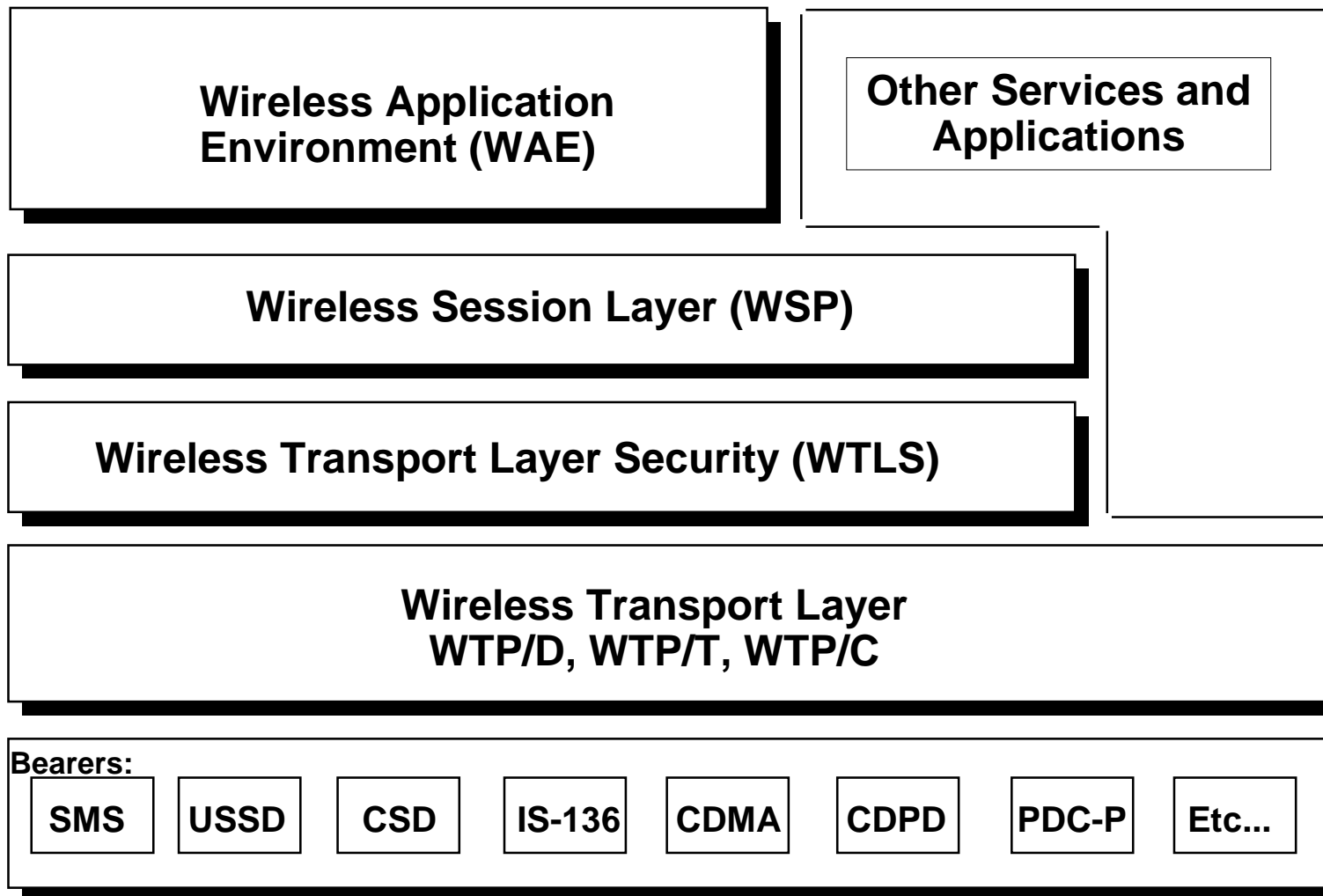


# What is defined in WAP ?

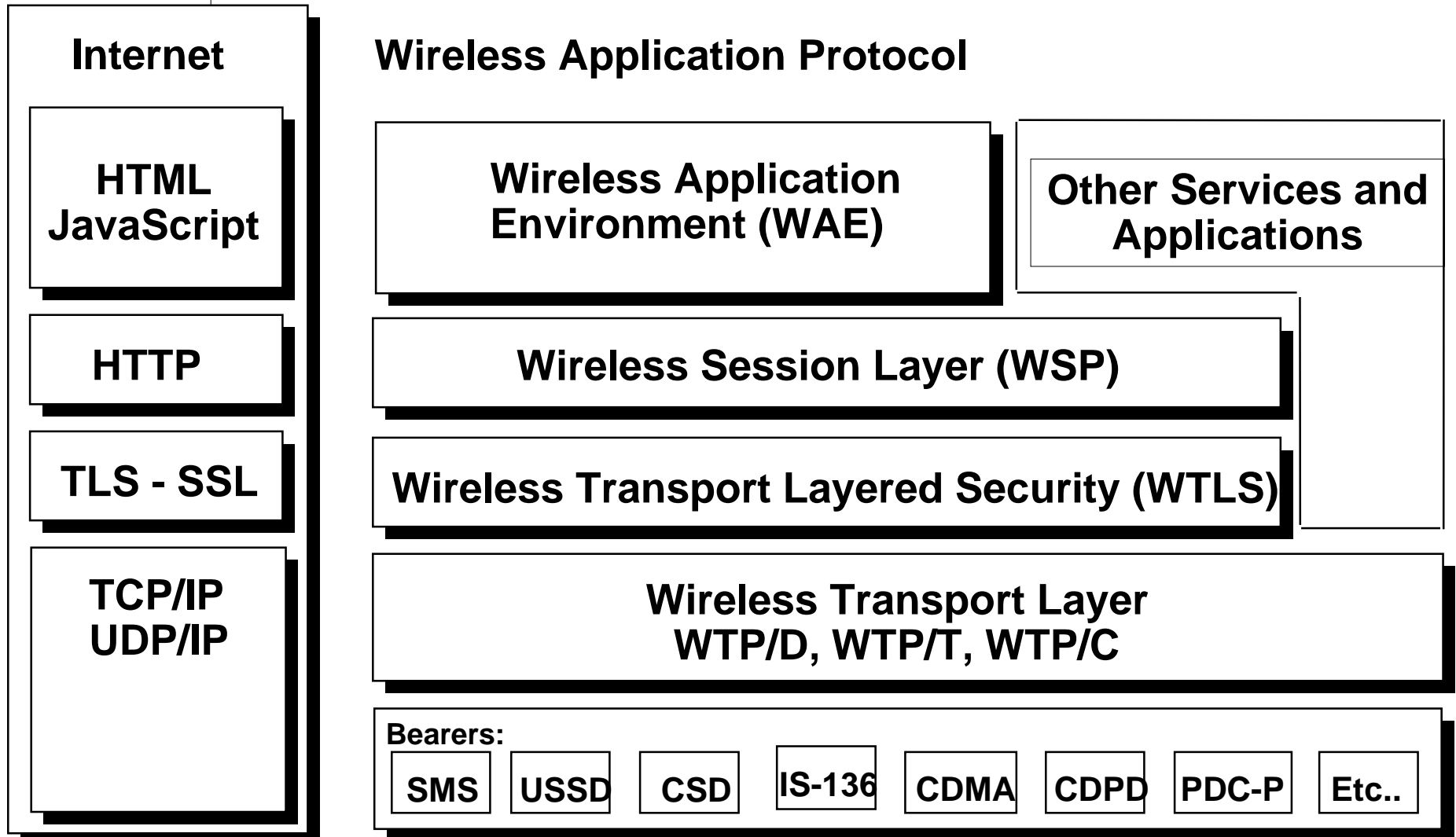
- **Micro-Browser**
  - concept that is similar to the Internet browsing
- **Scripting similar to Javascript**
  - provide means for dynamically enhancing MS capabilities
- **WTA / WTAI**
  - access telephone functionality e.g. call feature control
- **Content formats e.g.**
  - business card
  - calendar event
- **Layered telecommunication stack including**
  - Application
  - Session
  - security
  - Transport

# WAP Architecture

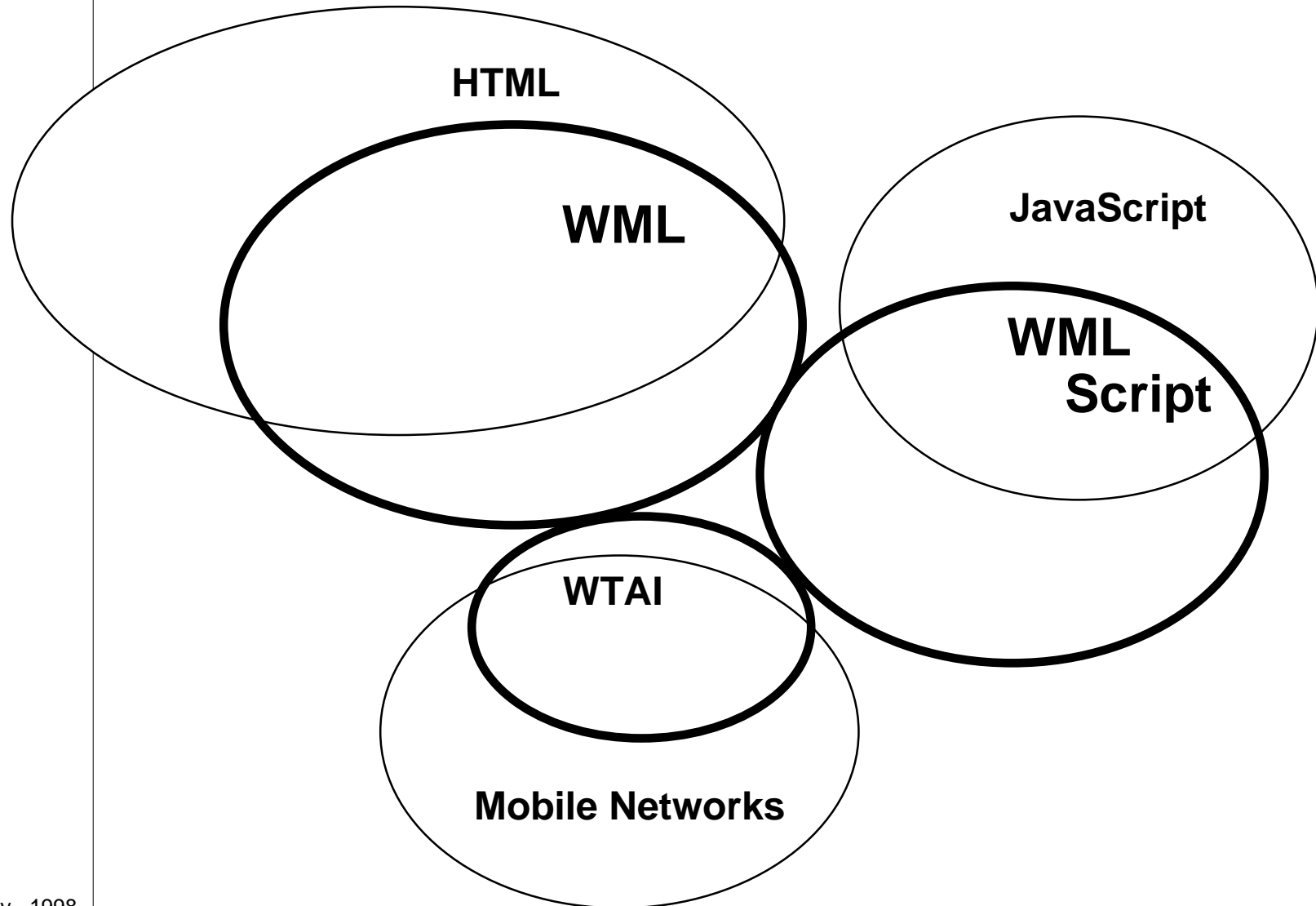
## Wireless Application Protocol



# Comparison between Internet and WAP Architecture

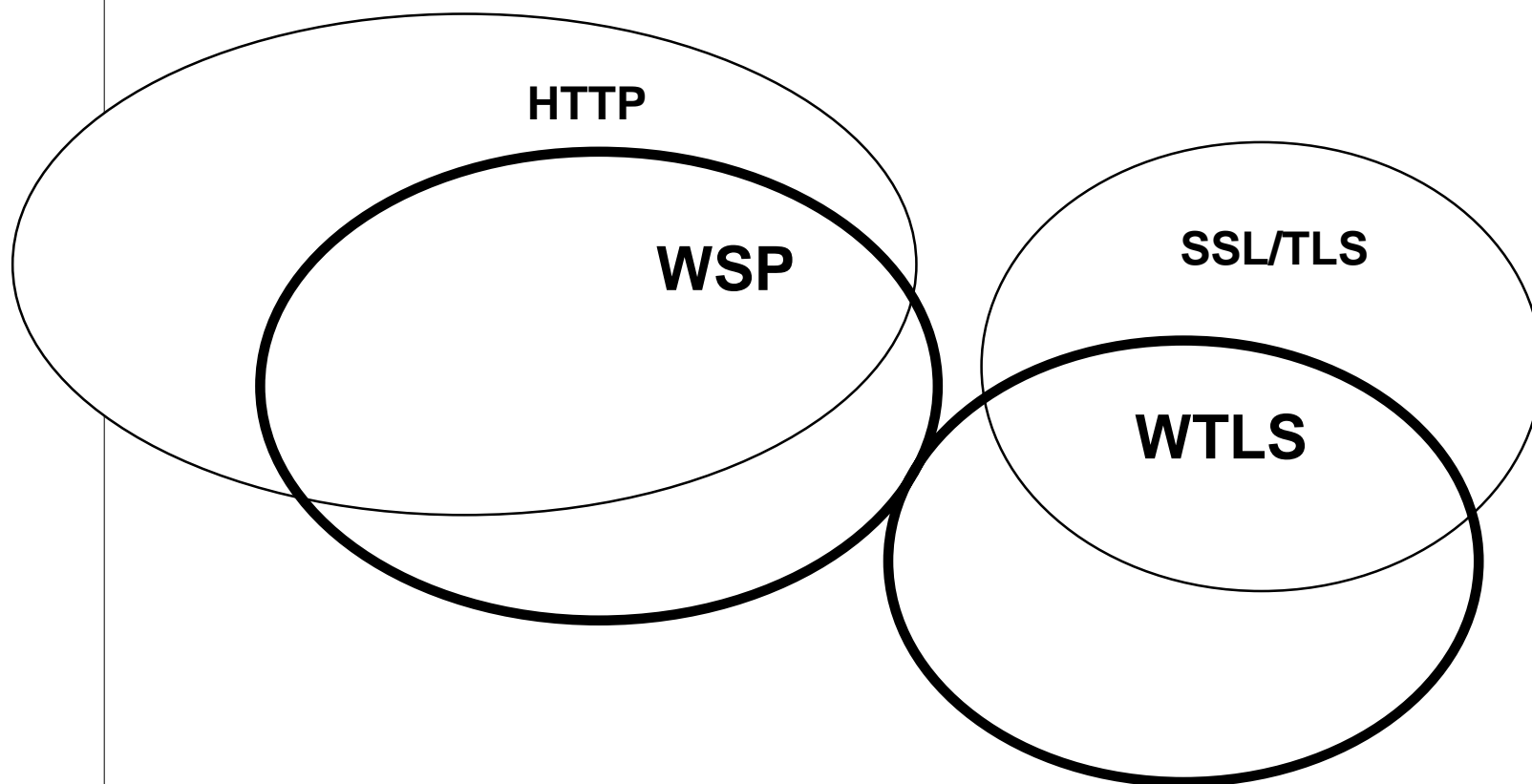


# Concept Comparision - WAE

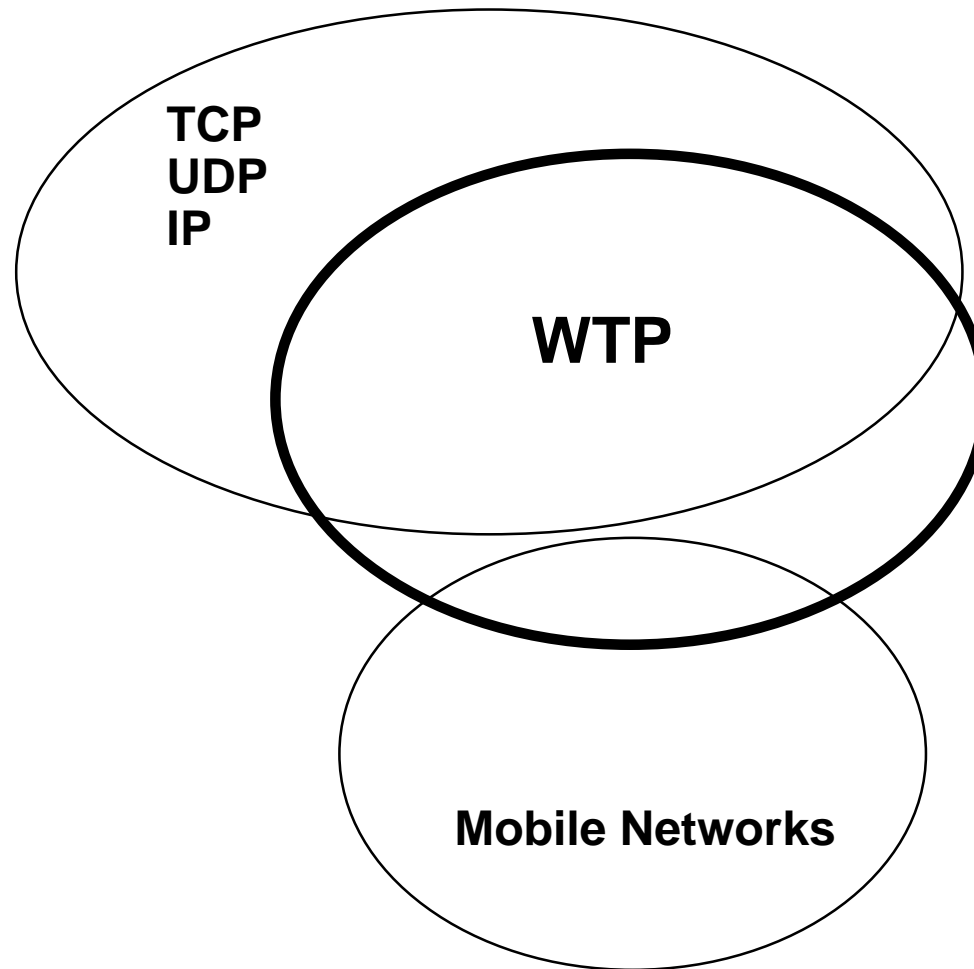




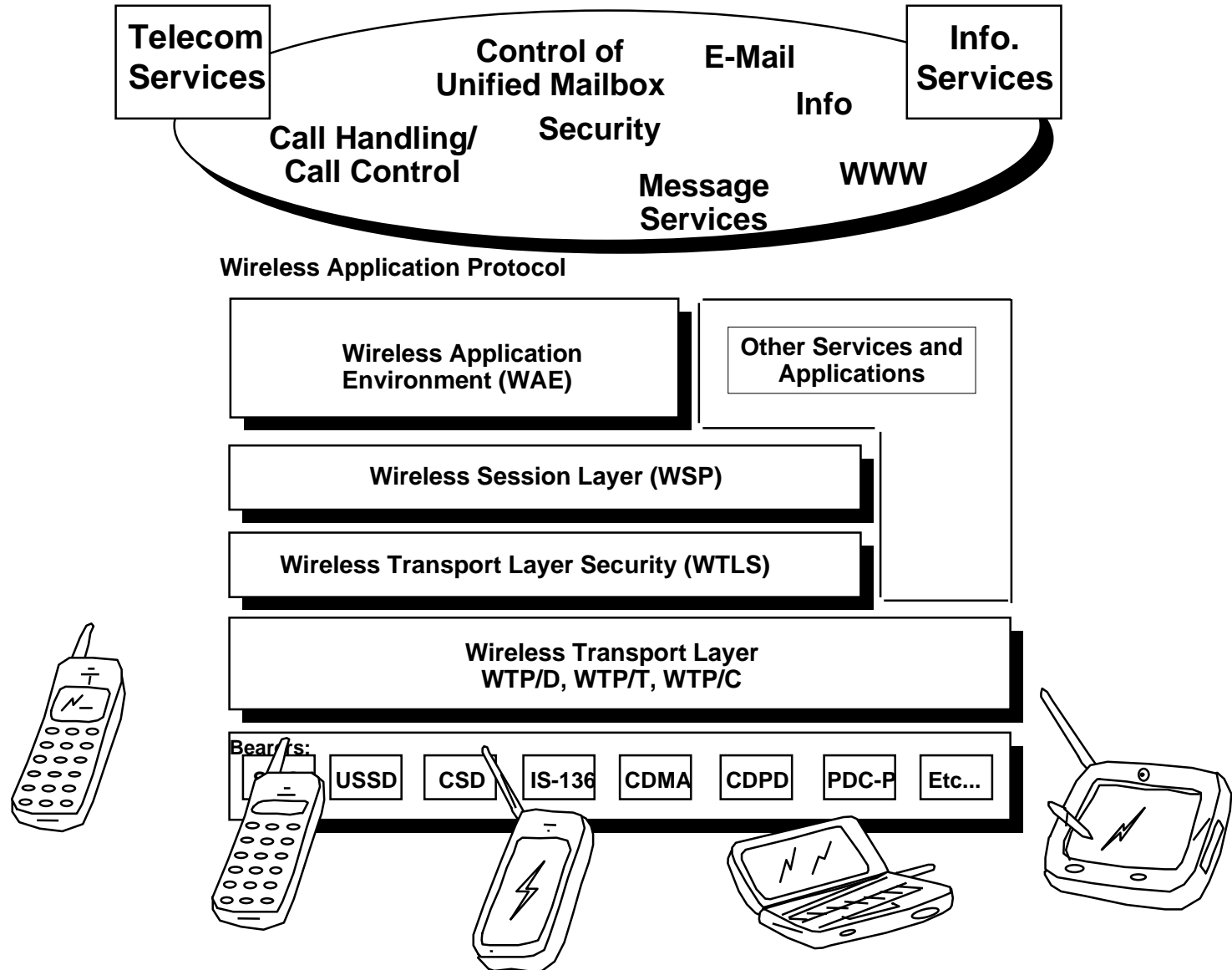
# Concept Comparison - WSP and WTLS



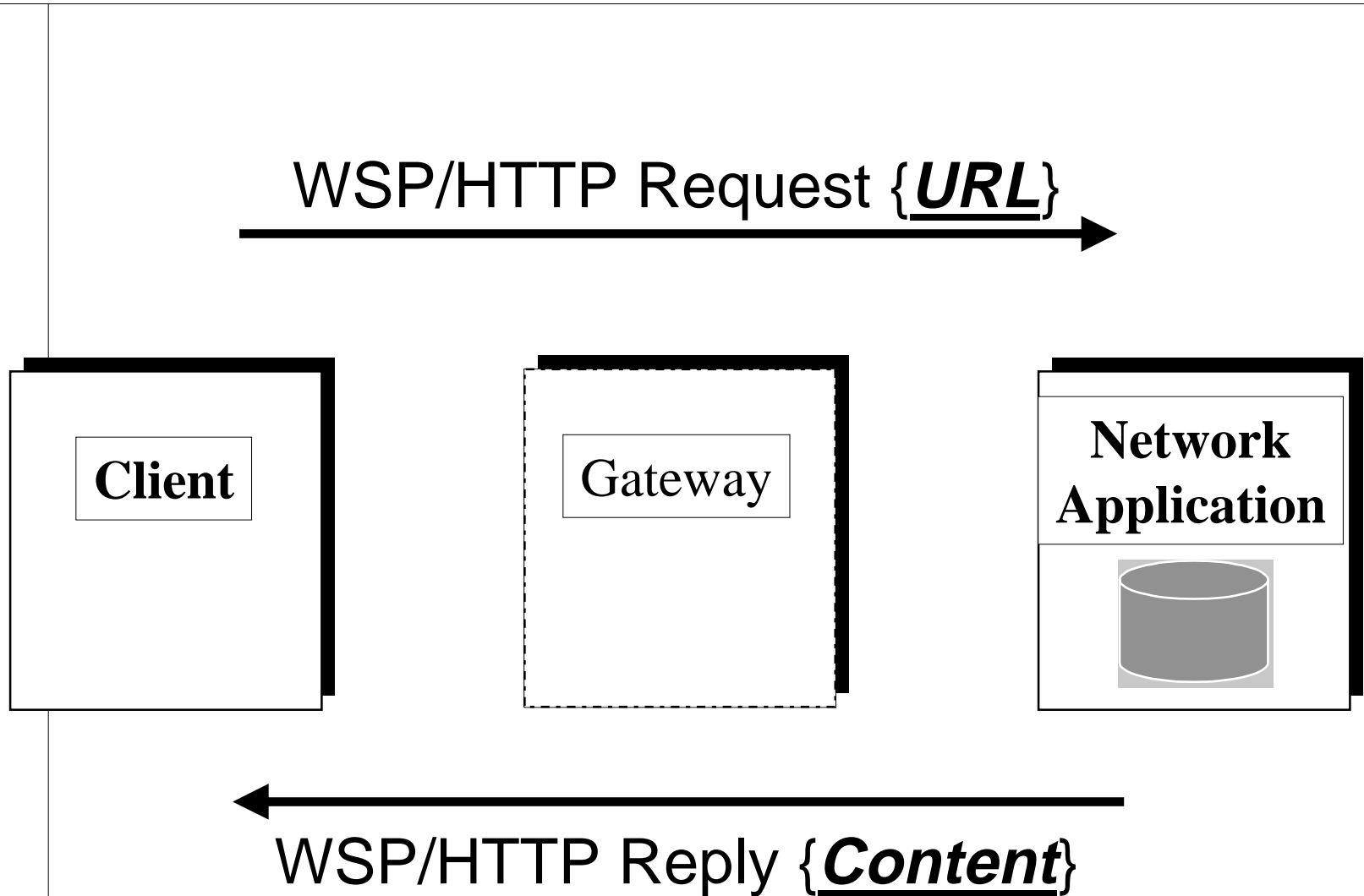
# Concept Comparison: WTP



# Concept for Wireless

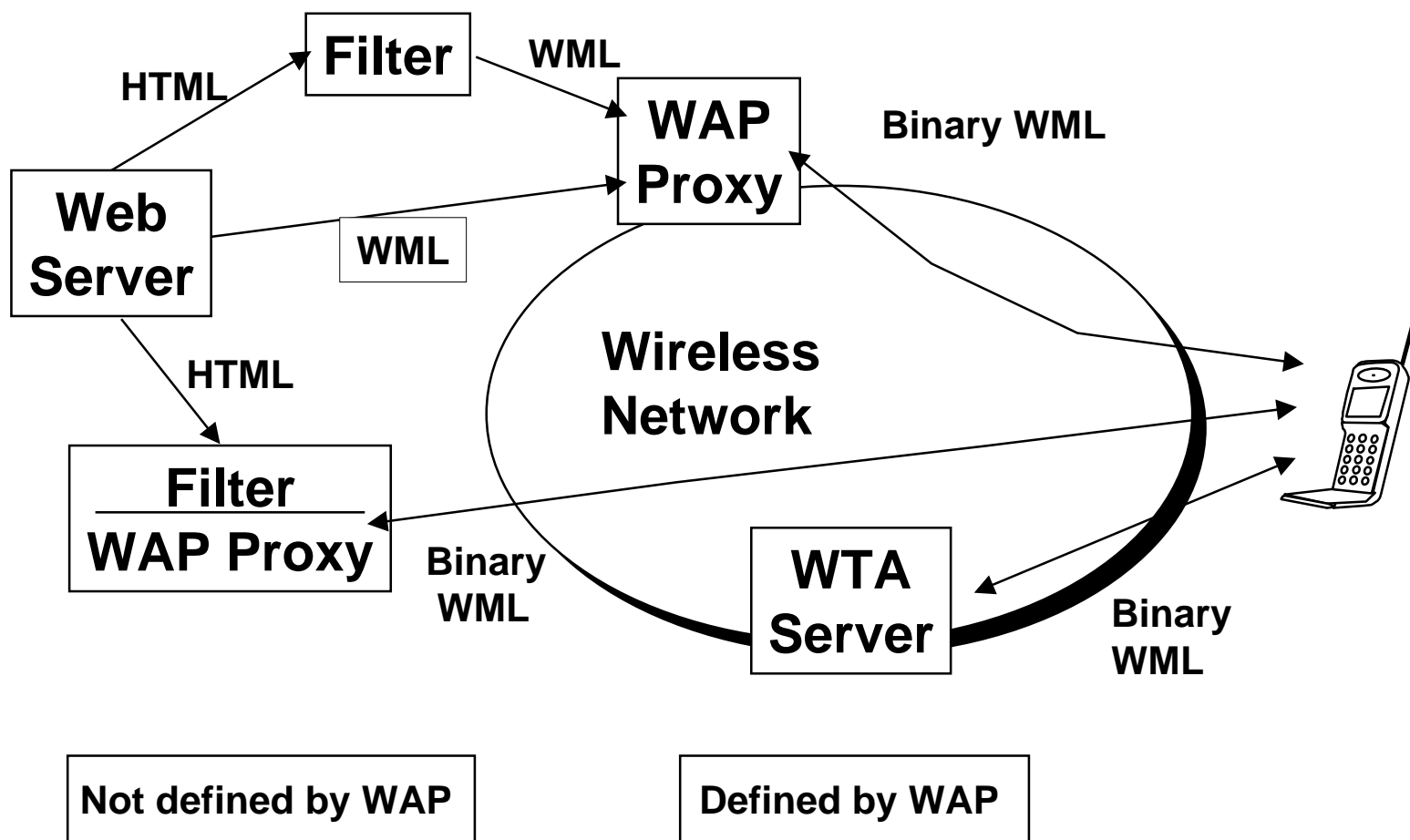


# WAE Abstract Network Architecture

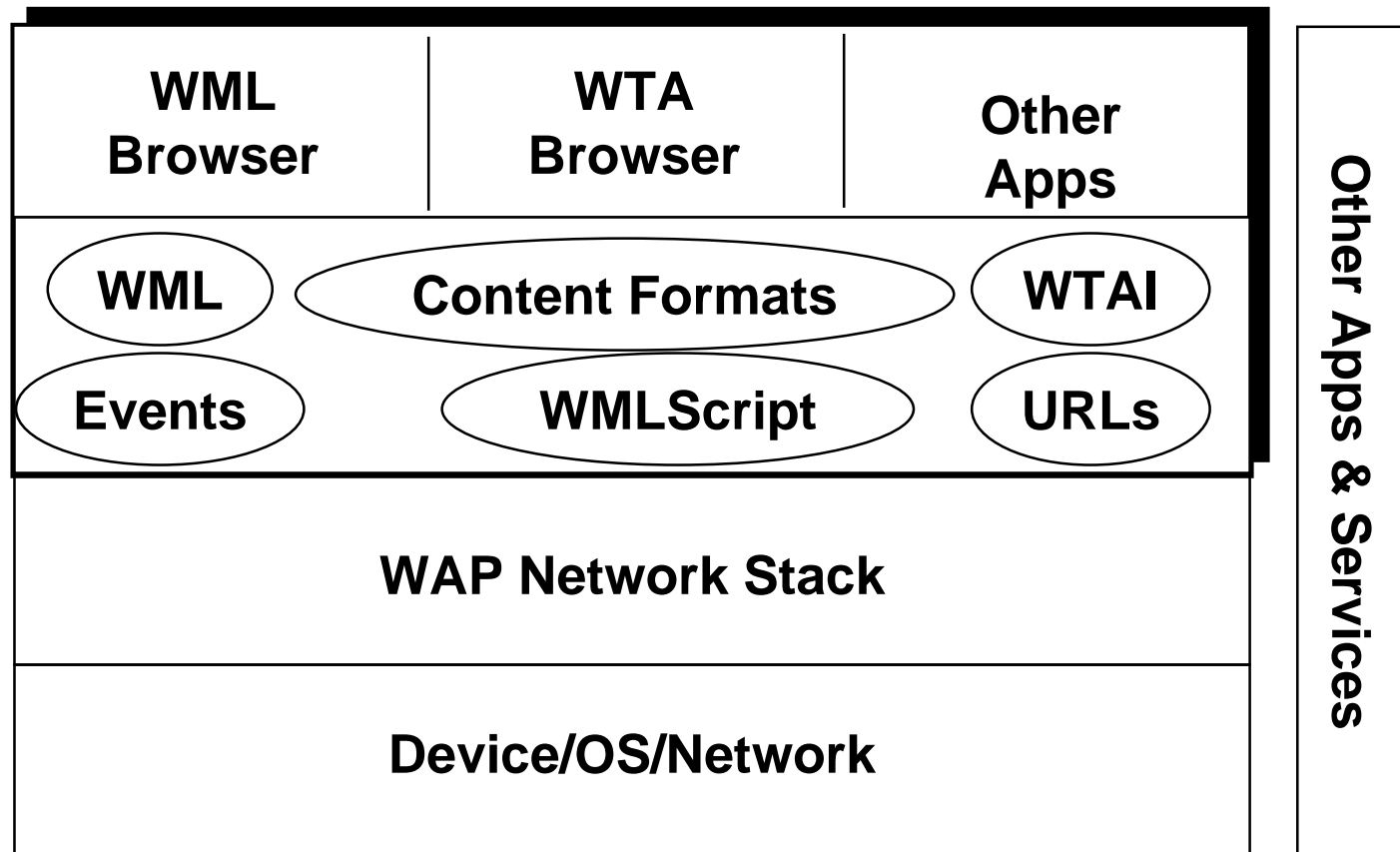


# WAP and Related Network Elements

- Binary format to the client
- Filtering and proxy technologies

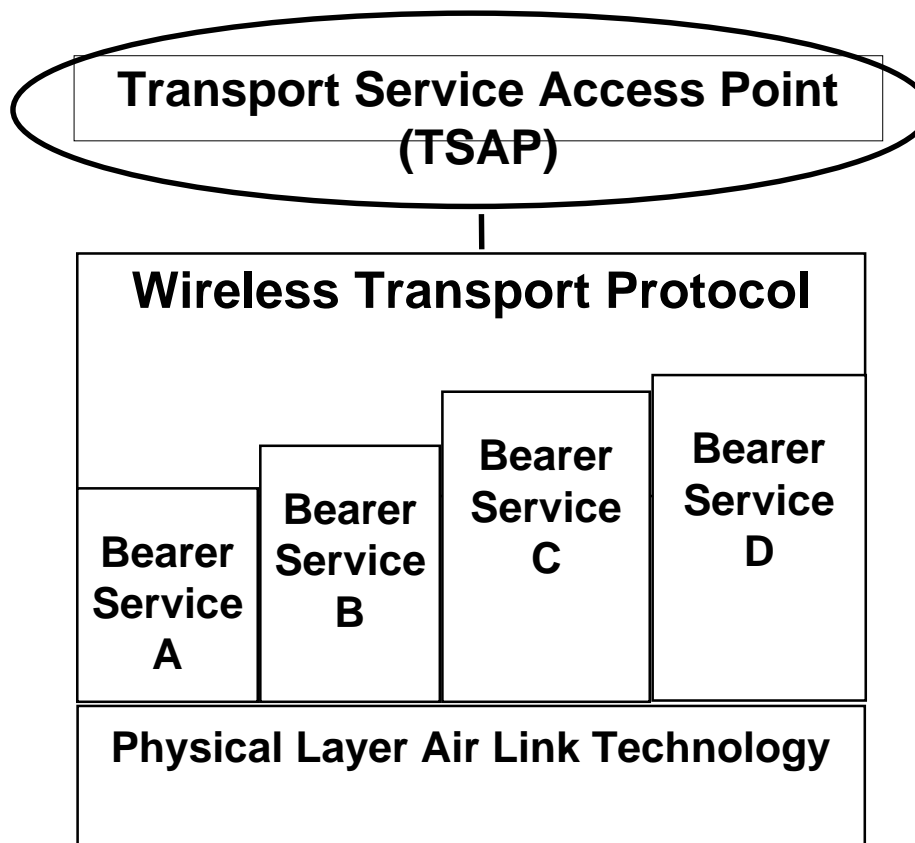


# WAE In-Device Architecture



# Architecture

- **WTP Architecture illustrates the integration of underlying bearers to a common service**



# Summary

- **WAP specification is a global, open standard**
- **Forum open for membership**
- **Specs available on the Web for all to comment**
- **Over 130 attendees at first meeting in London last week**
- **WAP is catalyst for mass-market interactive services growth**

**[www.wapforum.org](http://www.wapforum.org)**