Frequently Asked Questions

API:

Source: Wikipedia (*en.wikipedia.org*)

In computer programming, an **application programming interface** (**API**) specifies how some software components should interact with each other. An API comes as just a specification of remote calls exposed to the API consumers

When used in the context of web development, an API is typically defined as a set of Hypertext Transfer Protocol (HTTP) request messages, along with a definition of the structure of response messages, which is usually in an Extensible Markup Language (XML) or JavaScript Object Notation (JSON) format. While "web API" historically has been virtually synonymous for web service, the recent trend (so-called Web 2.0) has been moving away from Simple Object Access Protocol (SOAP) based web services and service-oriented architecture (SOA) towards more direct representational state transfer (REST) style web resources and resource-oriented architecture (ROA).[6] Part of this trend is related to the Semantic Web movement toward Resource Description Framework (RDF), a concept to promote web-based ontology engineering technologies. Web APIs allow the combination of multiple APIs into new applications known as mashups.[7]

Web use to share content

The practice of publishing APIs has allowed web communities to create an open architecture for sharing content and data between communities and applications. In this way, content that is created in one place can be dynamically posted and updated in multiple locations on the web:

- Photos can be shared from sites like Flickr and Photobucket to social network sites like Facebook and MySpace.
- Content can be embedded, e.g. embedding a presentation from SlideShare on a LinkedIn profile.
- Content can be dynamically posted. Sharing live comments made on Twitter with a Facebook account, for example, is enabled by their APIs.
- Video content can be embedded on sites served by another host.
- User information can be shared from web communities to outside applications, delivering new functionality to the web community that shares its user data via an open API. One of the best examples of this is the Facebook Application platform. Another is the Open Social platform.[8]
- If content is a direct representation of the physical world (e.g., temperature at a geospatial location on earth) then an API can be considered an "Environmental Programming Interface" (EPI). EPIs are characterized by their ability to provide a means for universally sequencing events sufficient to utilize real-world data for decision making.

What is the purpose of API

- Developers can build applications using APIs
- Enterprise can integrate external applications / add additional features into their applications

APIKey : Secured key given to developers

How to get API Key

- Go to the desired website and find API/ developer page
- Register as a developer
- Get API Key

Websites Categories

- E-commerce: ebay.com
- Audio / Video: Youtube.com
- Messaging: Twilio.com, way2sms.com
- Finance: Intuit
- Email: Gmail, Yahoo mail
- Enterprise: Salesforce.com
- News: NY Times
- Social networking: Facebook.com, Twitter.com

EndPoints

Endpoint would contain the requisite GET, PUT, POST. Endpoints provides remote methods accessible to external clients

Methods

An application has various functions, which can be invoked used API methods. For Instance, lets take student management software

Method	Description
Search	Search students
Insert	Insert Students
Delete	Delete Students
Pay	Pay Fee

Parameters:

In order to access any API, developers need to pass parameters. For Example to search students, developers need to pass followings params

API key – to authenticate developers

Gender:

Parameters	Value	Desc
API Key	Secured Key	Developer will be given a secured api key in order to access the function/ applications

Method name	search	
Class	Class	Integer
First name	Steve	String
Last name	Watson	String
Age	Age	Integer