

# Dark Net

## The Hidden Side Of Web

**Dark Net is a specific part of the hidden Web where one can operate in total anonymity. It isn't illegal to browse the dark web in most countries, but using some of the dark web services can be illegal. Access of dark web is a little like stepping back in time to the early days of the internet as the sites are often rudimentary in style. Search engines such as TOR, I2P and Freenet are used to access Dark web**



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Whenever someone searches any text or image through any commercial search engine like Google, Bing, Yahoo etc., within flick of seconds, one is shown links of lakhs of web pages containing information that is searched for. One may or may not be satisfied with links returned, but these links returned are from only 4-5% of the information that is available in the cyberspace. Shocking indeed, but it is akin seeing the stars in the sky but there is more than meets the eye. The Universe is full of different galaxies that stretch further than you could imagine. The average computer user with an Internet connection has access to an amazing wealth of information. But there's also an entire world that's invisible to your standard Web browser.

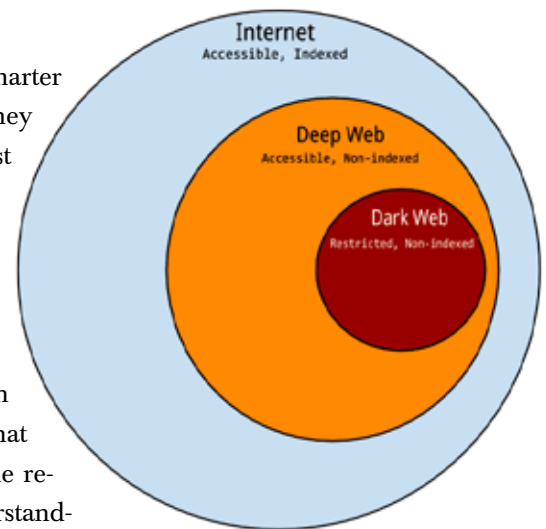
With search engine getting smarter day by day to the extent that they can predict your search, suggest you pages matching your requirements, track your search history, still they show infinitesimal of the Information out of what is available. Some studies conducted even say search engines show about 1% of what is available online. Where is the remaining information? For understanding that let us dig deep into the cyber world.

The Internet space is divided into three layers of Surface Web, Deep Web and Dark Net or Invisible Net.

### THE SURFACE WEB

The normal search engines like Google, Yahoo, Bing, Firefox search by crawling the links available which someone has published with a URL or website address. If a web page has no link, it can't be crawled or indexed. The page would not appear as a result on a search engine.

Because search engines browse the surface of what's available online, the websites they show on their results pages are part of what's called the Surface Web. Using search engine is like scanning the horizon with your naked eye.



The three layers of Internet space

## THE DEEP WEB

The Deep Web is anything not accessible through the commercial search engines. This is the portion of the web that constitutes the maximum of web space. Deep Web pages include information protected by a login, a website database, or a page that doesn't have a link. This information is meant to be private, so those sensitive web pages aren't crawled by search engines. You actually access the deep web routinely, every day. The emails in your Gmail account, your online bank statements, your office intranet, direct messages in Twitter, photos you've uploaded to Facebook and marked as private. These are all the deep web.

Anytime you log in to an account, or search for information directly on a web page, you're getting access to Deep Web content that won't show up on a search engine. And that's a good thing. If someone Googled your name, you wouldn't want your banking information or Amazon wish list

showing up in results. That information is meant to be private, so those sensitive web pages aren't crawled by search engines.

Next time you do a Google search, keep in mind that you're seeing a very limited version of what's available in cyberspace. Sure, you'll be glad you can't see it all. But if you want the best view of what's out there, you need access to databases that Google can't show. Start searching the Deep Web today!

## THE DARK WEB

Dark net is a specific part of that hidden Web where you can operate in total anonymity. Without being tracked, on negative side, people can access websites that sell drugs, weapons and they can even hire assassins, but on the positive side, it can be used by whistle blowers, journalists to alarm government agencies about something happening illegal that is about slavery, child labour, human traffick-

ing, prostitution etc. or political dissidents who want to evade government censors. It isn't illegal to browse the dark web in most countries, but using some of the dark web services can definitely be illegal.

## HOW TO ACCESS DARK WEB

The TOR (The Onion Router) Browser is the main application for accessing the dark web. The onion metaphor indicates the layers of security that work to conceal a user's location, and the browser enables you to access hidden web sites with the .onion domain suffix. In the mid-1990s, US military researchers created a technology that allowed intelligence operatives to exchange information completely anonymously.

The TOR network is a collection of "volunteer" computer networks that send users' encrypted traffic to multiple servers before pulling up content. That way, a user's browsing session is so jumbled up, their identity and location is almost untraceable.

Usually, when you visit a website, your Internet service provider can see that you are visiting that site. If you use TOR, the location that you appear to be in will change. For example, you can be in USA and send your traffic through Germany, Sweden and Russia, and the website that you're visiting will see that someone in Russia is visiting, not you in USA.

Using the dark web is a little like stepping back in time to the early days of the internet. Sites are often rudimentary in style, and there are few other search engines like I2P and Freenet beside TOR to help you find your way around. The best way to find sites is through directories such as The



Hidden Wiki, which maintains a list of many of them. It is also extremely slow, an inevitable side-effect of the anonymizing process. Sites also go down frequently.

## DARK NET LEGALITY

After learning about the Dark Web, you may be tempted to use it, but have a question in mind whether it is legal or not? It is not illegal as such in most of the countries, though buying illegal products or viewing illegal content is punishable as per law. For example, Julian Assange, WikiLeaks is a notorious Dark Web site that allows whistle-blowers to anonymously upload classified information to the press and no charges for publishing the con-

tents have been levied on him by any US Court. Even Facebook has a Dark Web site. Recently, the social media giant launched a TOR hidden service so users could avoid surveillance or censorship.

However proper care should be kept in mind before entering into it. Use TOR browser preferably, never visit any site to satiate your curiosity, use Linux Mint or Ubuntu or other version of Linux having full security features, put tape on your Laptop camera and lastly and very importantly do not mess, abuse or provoke anyone anytime.

## CONCLUDING PERSPECTIVE

The dark web is a muddy arena, and

even reading the descriptions of many of the sites can take you into extremely uncomfortable territory. And even though the dark web can take us into some murky waters, the primary tool for accessing it, TOR continues to have legitimate uses of its own. Most things, both online and offline, can be used for bad purposes, right? But that doesn't make them bad in themselves. The same is true here.

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## E-Gov Products & Services - E-Dashboard for Elections

### FEATURES

- Populating data on e-Dashboard from authentic source in real time mode
- Monitoring and transparency in the entire system at different levels
- Swapping all traditional communication means (Phone/Fax/e-Mail) for dissemination of information and replaced with new live online e-Dashboard
- Statistical view of various parameters in instant mode
- Public view forwarding step towards transparent and responsive governance
- Contender for more such applications to be percolated under Digital India regime across the country
- Innovative and exemplary efforts of NIC-Haryana for other states in the country and can be rolled out in other states with minor modifi-

cation

- Data repository of all winning candidates can be used as an application data for various governance activities

### ADDITIONAL BENEFITS

- Government can reach out to all representatives through a broadcast SMS using the database ULB's representatives
- Any mobile based campaign in the interest of general public can be run using this database
- Database will provide a comprehensive framework to the Government for extending various welfare schemes and can be used for monitoring purposes further

### ICT TECHNOLOGY & INFRASTRUCTURE USED

- Web Server: Windows Server 2008

enterprise (64 Bit OS) IIS 7.0

- Blade servers (E5530 2.4 GHz dual processor) with 32 GB RAM
- Database Server: Windows Server 2008 enterprise (64 Bit OS)
- Blade servers (E5530 2.4 GHz dual processor) with 128 GB RAM
- Internet Bandwidth: NICNET/ NKN 1Gbps connectivity (Hosted at NIC Haryana Data Centre)
- Software – ASP.Net with C# and database -SQL Server 2012 Enterprise, JQuery

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