Our Experience with Zeroshell

The following Document explains our experience with Zeroshell as an internal router and will address the way Zeroshell was configured together with the shortcomings that we faced on the setup that we currently have. To say the least, so far it’s the most notable open source router that works great with the simplest configurations there is.

**NB: The setup explained below is the precise or most notable easy way to get up Zeroshell up and running.**

Before doing anything with Zeroshell, there are a few things that one must possibly know before claiming that Zeroshell doesn’t work at all and below are the list of things that possible one should take **NOTE** of:

1. Take note of the default settings that Zeroshell comes with e.g. Default IP Address which in this case is 192.168.0.75
2. Taking the note above will ensure that whenever you want to configure Zeroshell over a network, one should make sure that Zeroshell is inside one’s network.

**Below is what we did to get Zeroshell working**

Short Description of what we intended to achieve and how we achieved it.

Our organization has a firewall at the end of the network i.e. our firewall is the gateway to the internet as shown below by the diagrams
This is the firewall that routes all traffic to the internet

These are the clients that Zeroshell serves and their subnet is the 192.168.0.0 network

Zeroshell is software router and henceforth routes all requests from one subnet to another. It is configured with two network cards (Logically it has two networks) where each card has a Unique IP Address. The Unique IP addresses are (192.168.1.6) which is in the (192.168.1.0) network and the other one is (192.168.0.1) which is in the (192.168.0.0) network. Simple put: Our network comprises
of two subnets, the 192.168.0.0 network and the 192.168.1.0 network and Zeroshell is configured in such a way that all clients in the 192.168.0.0 have their http requests intercepted by Zeroshell’s captive portal and all these requests are then routed to the 192.168.1.0 network.

Example

Cephi’s Network has clients that connect through Zeroshell and all their requests are routed from the (192.168.0.0) network to the (192.168.1.0) through the 192.168.0.1 gateway, the routing table in place continues to route the traffic into the (192.168.1.0) network through the other network interface card (192.168.1.6). When all the traffic is now in the (192.168.1.0) network, all traffic is again routed to the final gateway (192.168.1.1). Which is our firewall?

Screen shorts of the most important parts to consider when building Zeroshell
The only shortcoming that we have faced has been the http proxy service. It works for a while but then in the end it hangs and it is kind of unreliable. But altogether it’s a perfect distro