**FIREWALL AND NETWORK MANAGEMENT IN HYBRID CLOUD**

**A PROJECT REPORT**

**Submitted by**

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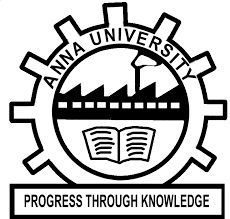
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ABSTRACT:

This paper explores the intricacies of managing firewalls and networks within hybrid cloud environments. Where resources are distributed across both on-premises infrastructure and public cloud platforms. Setting up a hybrid cloud platform in a small scale will help to manage and compute the data scrapes everywhere. But network security should be managed properly to maintain privacy. As cloud computing technology continues to grow at a rapid pace, it introduces even more vulnerabilities. Even in personal and home cloud this will be a much bigger problem without network security. So, we building a data sharing hybrid cloud in a home network. As organization increasingly adopt hybrid cloud models to leverage the scalability and flexibility of the cloud while maintaining control over sensitive data, effective firewalls and network in hybrid cloud environments. It discusses the importance of consistent security policies, seamless network connectivity, centralized management tools to ensure efficient operation and robust security posture. Additionally, the abstract highlights emerging technologies and trend shaping future of firewall and network management in hybrid cloud deployments. By developing the cloud native firewall based and network managing system The past cloud security SDN is expensive and not much cost effective. To build a home data sharing cloud we are using the Azure and deploying the file cloud to manage files and secure the public cloud side of the hybrid cloud. We are using Hyper – V for the on-premise object storage. We can migrate the servers and network between private and public clouds. This method of hybrid cloud is flexible, secure, and scalable this method should be made to utilize anywhere such as small business, home cloud labs.

Key words: Azure, Hyper-V, SDN, Hybrid cloud, firewalls.

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**LIST OF ABBREVIATIONS**

|  |  |  |
| --- | --- | --- |
| VM - |  | VRITUAL MECHINE |
| SCVMM - |  | SYSTEM CENTERED VRITUAL MECHINE MANAGEMER |
| SQL - |  | STRUCTURED QUREY LANGUAGE |
| API - |  | APPLICATION PROGRAMMING INTERFACE |
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