





# **HIGH PERFORMANCE DISTRIBUTED STORAGE**



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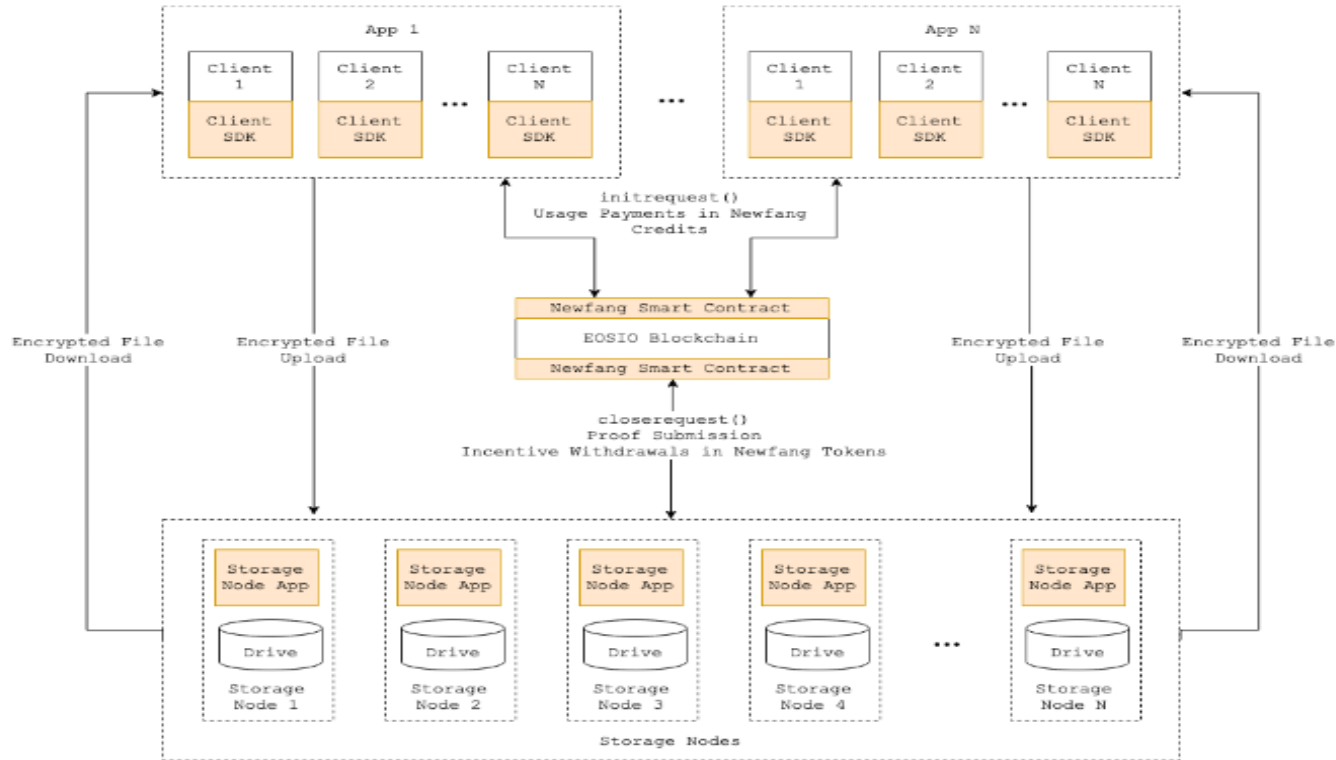


# PROBLEM STATEMENT



IPFS is a peer-to-peer version controlled filesystem that synthesizes learnings from many previous successful systems. IPFS combines a distributed Hash table, an incentivized block exchange, and a self-certifying namespace . IPFS is a peer-to-peer hypermedia protocol to make the web faster, safer, and more open. According to the characteristics of IPFS, we propose an improved P2P file system scheme. We address the high-throughput problem for individual users in network by introducing the role of content service providers. Consider data reliability and availability, storage overhead and other issues for service providers

# PROPOSED METHODOLOGY




# Hi difficulty\_measured test Newfang against IPFS

...and see how our Uploads/Downloads compare.


UPLOAD

Size: **1.18 KB** Type: **text/plain**

 IPFS

Upload time: **1.231**  
Download time: --

⚡ DOWNLOAD

 Newfang


Upload time: **2.031**  
Download time: **0.703**

DOWNLOAD

User	Action Type	File Size	IPFS	Newfang
turnabout_landed	download	61.19 KB	0.235	1.13
turnabout_landed	upload	61.19 KB	0.387	0.816
sentinel_continuous	download	61.19 KB		0.811
sentinel_continuous	upload	61.19 KB	1.538	1.437
midriff_joyful	download	85.66 KB	67.964	2.256
midriff_joyful	upload	85.66 KB	1.258	4.028
raid_weeping	upload	326.02 KB	5.315	4.519
requisite_inner-city	download	326.02 KB	71.058	0.544
requisite_inner-city	upload	326.02 KB	0.851	1.435
doorway_antiseptic	download	14.64 KB	64.976	0.8
doorway_antiseptic	upload	14.64 KB	0.44	1.834
claim_strangled	download	506.75 KB	86.723	0.879
claim_strangled	upload	506.75 KB	0.923	1.556
clarinetist_small-time	download	6.62 KB	0.109	1.902
clarinetist_small-time	upload	6.62 KB	0.231	1.064
prize_yellowing	download	6.62 KB	0.092	0.875
prize_yellowing	upload	6.62 KB	1.131	1.705



# REQUIREMENTS

- 🐦 Frontend :: HTML5, CSS3, JavaScript, VueJs
  - 🐦 Backend :: NodeJs, RPC, IPFS, NGINX, LetsEncrypt, CertBot
  - 🐦 Cloud Platform Used :: EC2 Instance of AWS
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# CLOUD PLATFORM REQUIRED

## **Amazon EC2 Instance Types**

Amazon EC2 provides a wide selection of instance types optimized to fit different use cases. Instance types comprise varying combinations of CPU, memory, storage, and networking capacity and give you the flexibility to choose the appropriate mix of resources for your applications. Each instance type includes one or more instance sizes, allowing you to scale your resources to the requirements of your target workload.