

# Mapping the Solid Ecosystem: focus on pod providers

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In a data-sharing ecosystem, different services allow ecosystem participants to exchange data and information in a secure and trustworthy manner. Technologies such as Solid enable more modular ecosystem services. However, Solid is merely the enabling technology, while the individual organizations create the actual value. As a result, new business models emerge within these ecosystems related to identity, storage, access management and so on.

This presentation focused on the business model related to Solid pod provisioning otherwise called ‘pod providers’. Solid pods are where data can be stored in a decentralized and interoperable manner allowing access to multiple parties using access control. Pod provisioning is the core business of these pod providers, one of its offerings (e.g. next to a wallet) or it is at the core of a larger software solution that is offered.

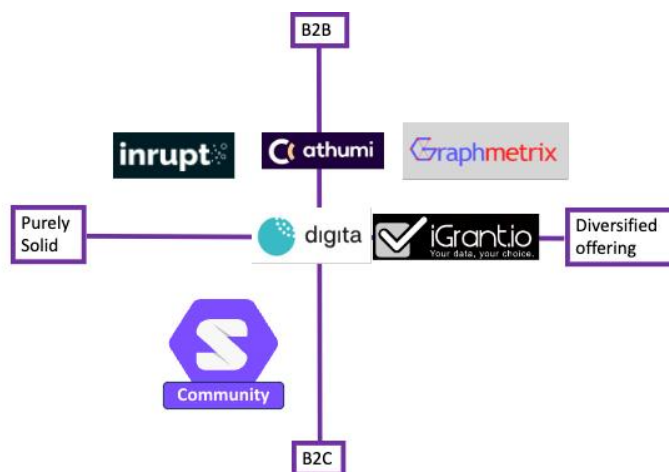


Figure 1: Overview of different types of pod providers according to two dimensions (1) B2B vs. B2C offerings, where B2B also includes B2G for simplification and (2) whether Solid is the core offering or part of a larger offering. For instance, for athumi we see that governance is part of the actual value they offer.

So far, three types of pricing models for pod provisioning are identified

1. Volume-based: price increases as the number of required pods or the amount of traffic (e.g. number of requests) increases.

2. Value-based: price increases as the value for the end-user increases (e.g. fixed percentage of value estimate)
3. License based: fee can be fixed or per tier e.g. SME vs. Large firms, tiers of pods...

For the costs we see the following main categories

- Software costs: Development, maintenance and R&D costs. These costs are either depending on person hours or license cost if outsourced. For pod providers, this includes specific costs of making software that is compliant with the Solid specifications.
- Hosting costs (bandwidth, storage and compute): either this is done in-house thus the hardware, electricity cost etc. or outsourced to a cloud provider such as Amazon.
- Customer support driven by manhours and number of customers. Given the novelty of Solid, this typically involves providing testing suites and workshops.
- Security costs, which is either development cost or outsourced e.g. to a security development center.
- Legal costs covering liabilities and compliance to regulations such as DGA.

Overall, the biggest cost occurs when pod providers have to scale thus increasing the cost of hosting, security, and software. This is feasible if revenues also scale accordingly. The business models in their current state are still quite novel and keep evolving. When these mature further, this will allow us to evaluate which pricing strategies are best aligned with the costs (e.g. pricing based on pods and traffic aligned with cost drivers as they both scale the same way). One way for them to grow is through key partnerships to help create awareness concerning Solid and to kickstart the market e.g. government can push towards more transparency and data sharing, however, larger private parties could also enable this. Additionally, when Solid becomes more widespread and pod providers mature, we will see how and if they compete with more traditional storage.

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