

The following line in [action](#) made me reflect:

sig application-data : Map AppDataValueHash (BitString, DeletionCriterion)

contains a map of hashes and [openings](#) of various data needed to verify resource logic proofs. The deletion criterion field is described [here](#). The openings are expected to be ordered.

Namely in two spots:

1. Why not use the word preimage instead of opening?
2. What is an ordered opening for the map data structure

## Preimage vs Opening

[specs.anoma.net](https://specs.anoma.net)

## Hash - Anoma Specification

The Anoma Specification is a collection of documents that describe the architecture, design, and implementation of the Anoma Network.

In the context of hashes, we say  $a$  is an opening of a hash  $h$ : Hash if  $h = \text{hash}(a)$ .

Isn't this just the preimage of the hash?

In particular I saw opening used in the definition of an [action](#).

Whereas I've seen preimage used in the [resource definition](#).

If they are indeed the same and I'm not misunderstanding what a preimage is, then maybe we should just use preimage in general?

## Ordering

what does it mean for the openings

to be ordered here. Are the hashes also ordered? what is the criteria? I'm unsure of what this section is trying to communicate.