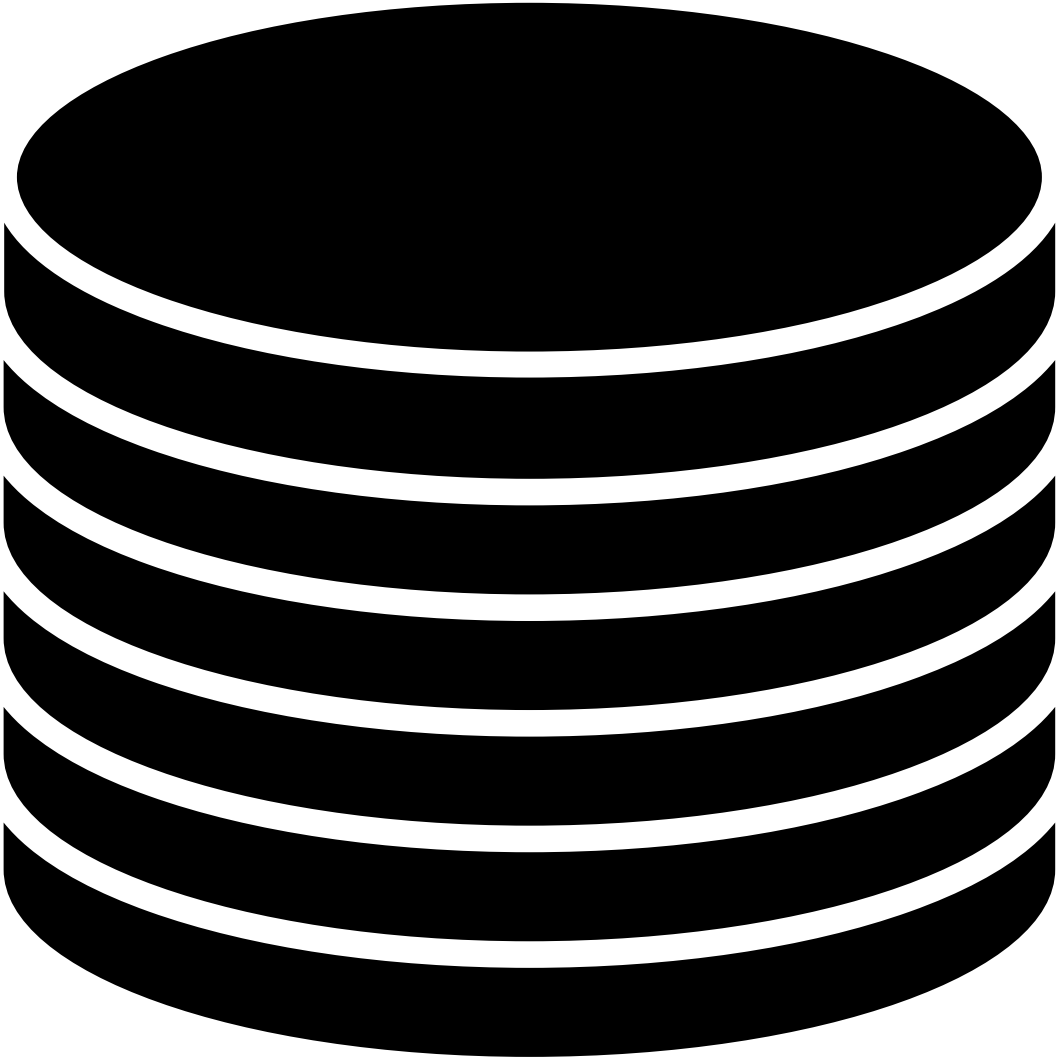

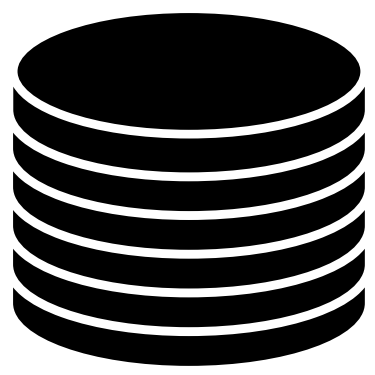

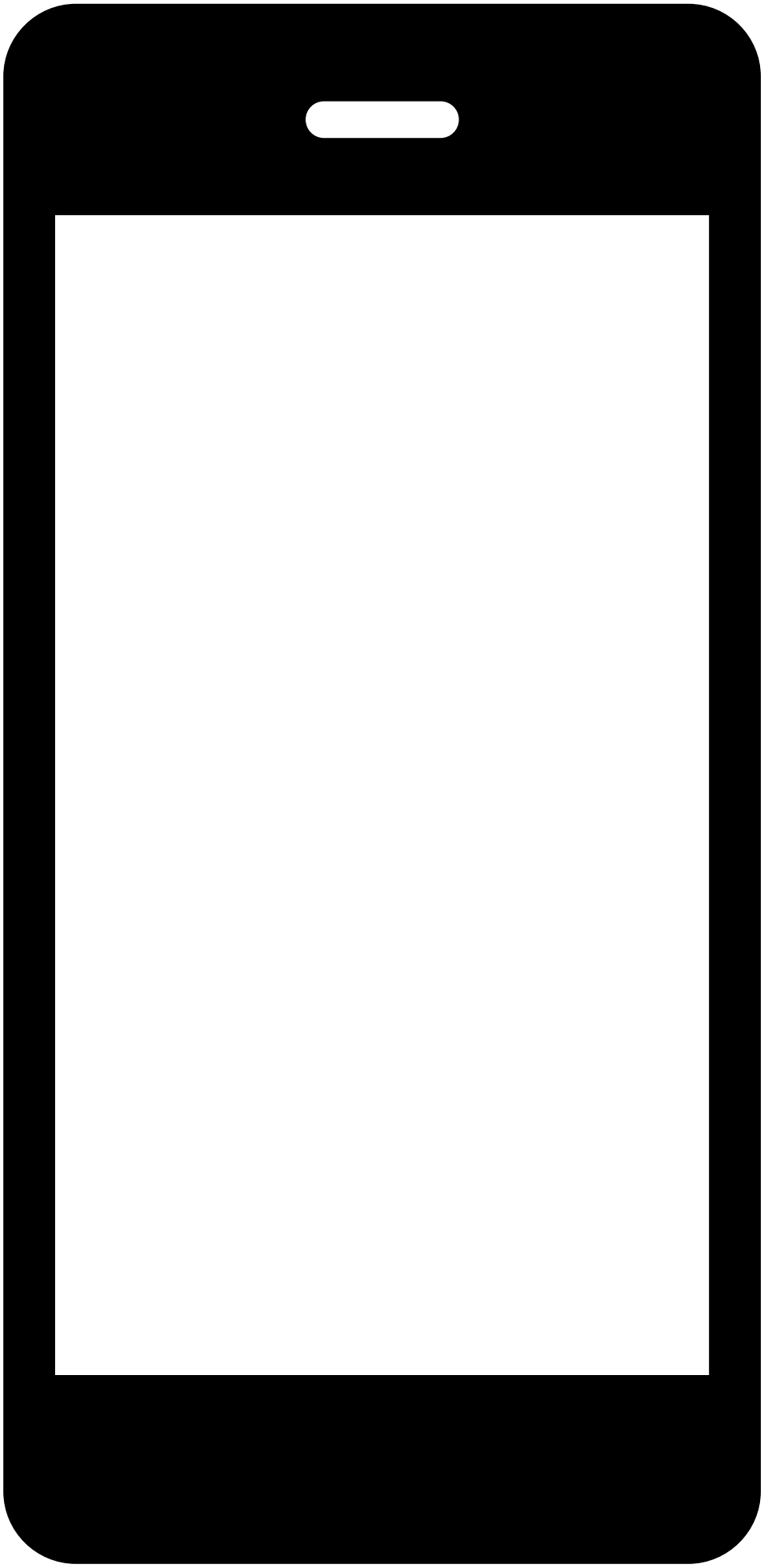

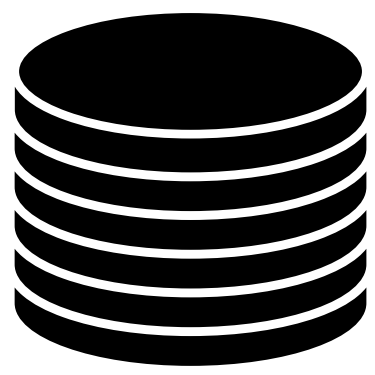

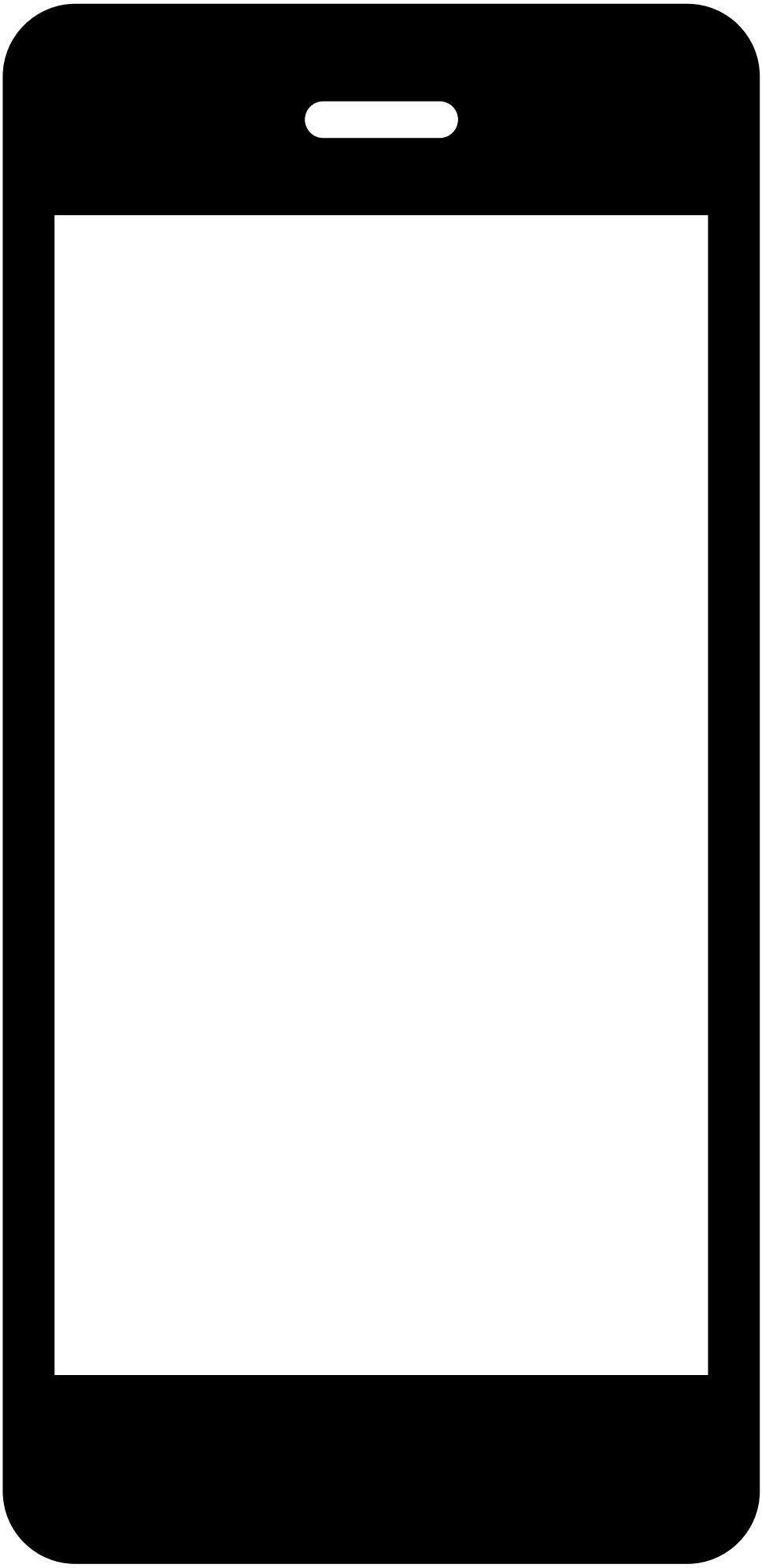

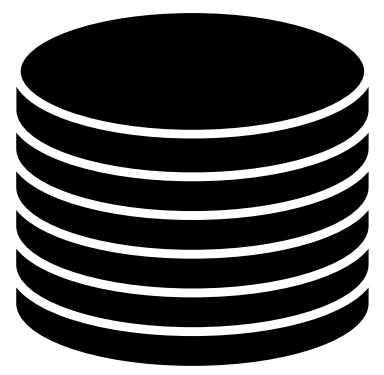

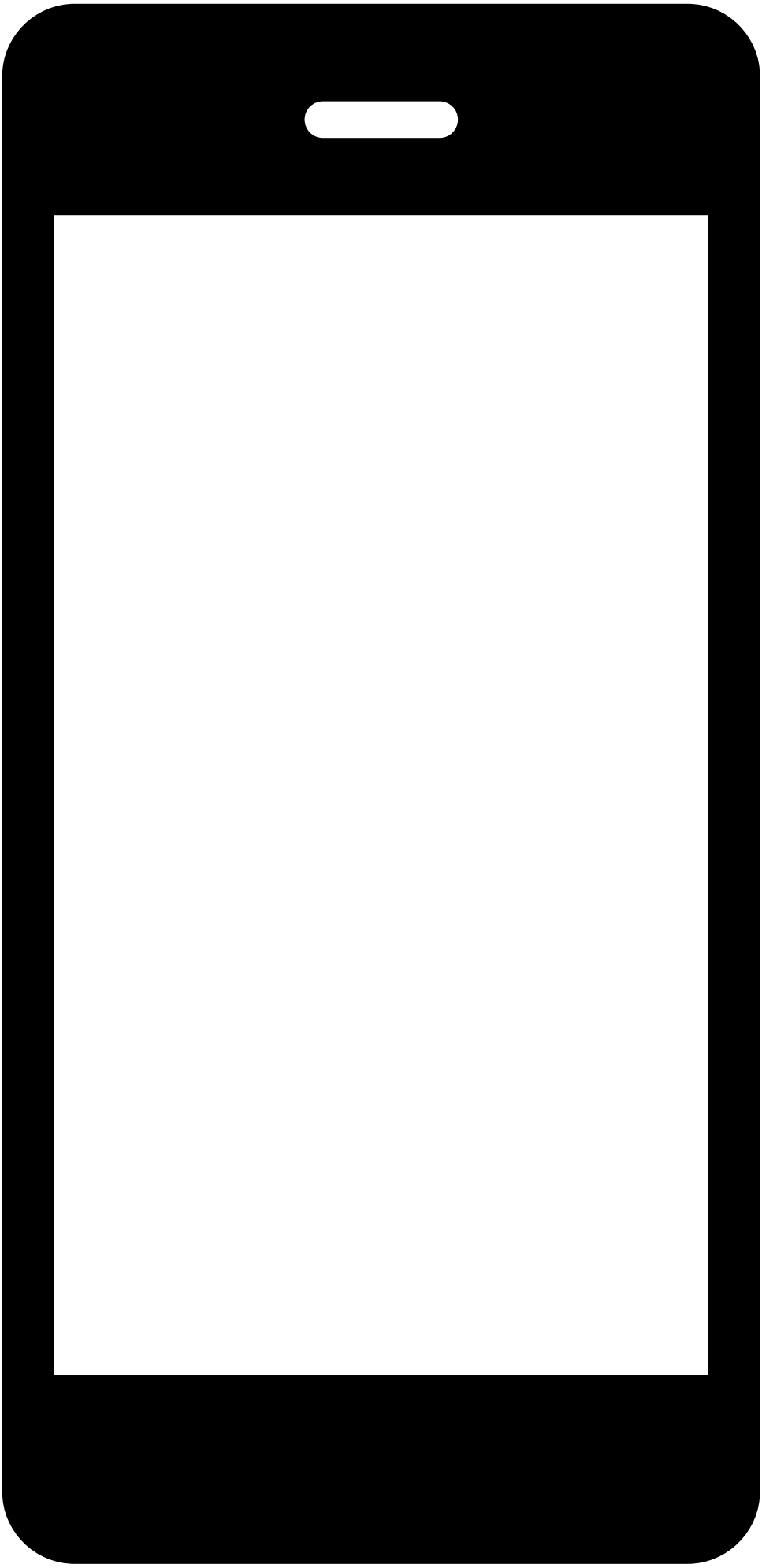

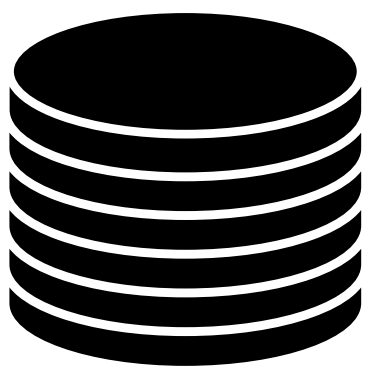

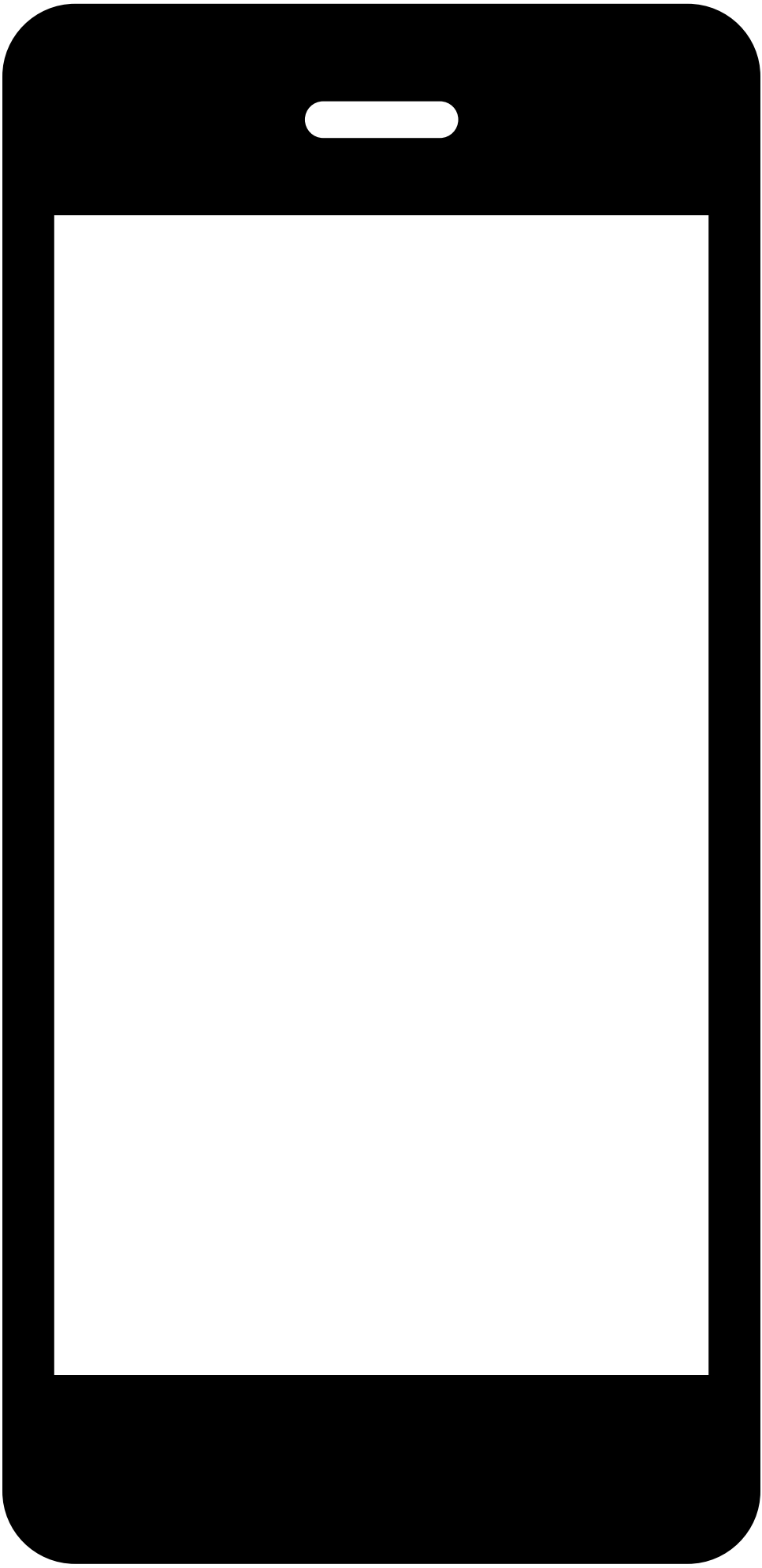

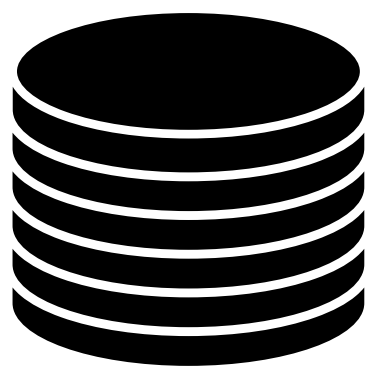

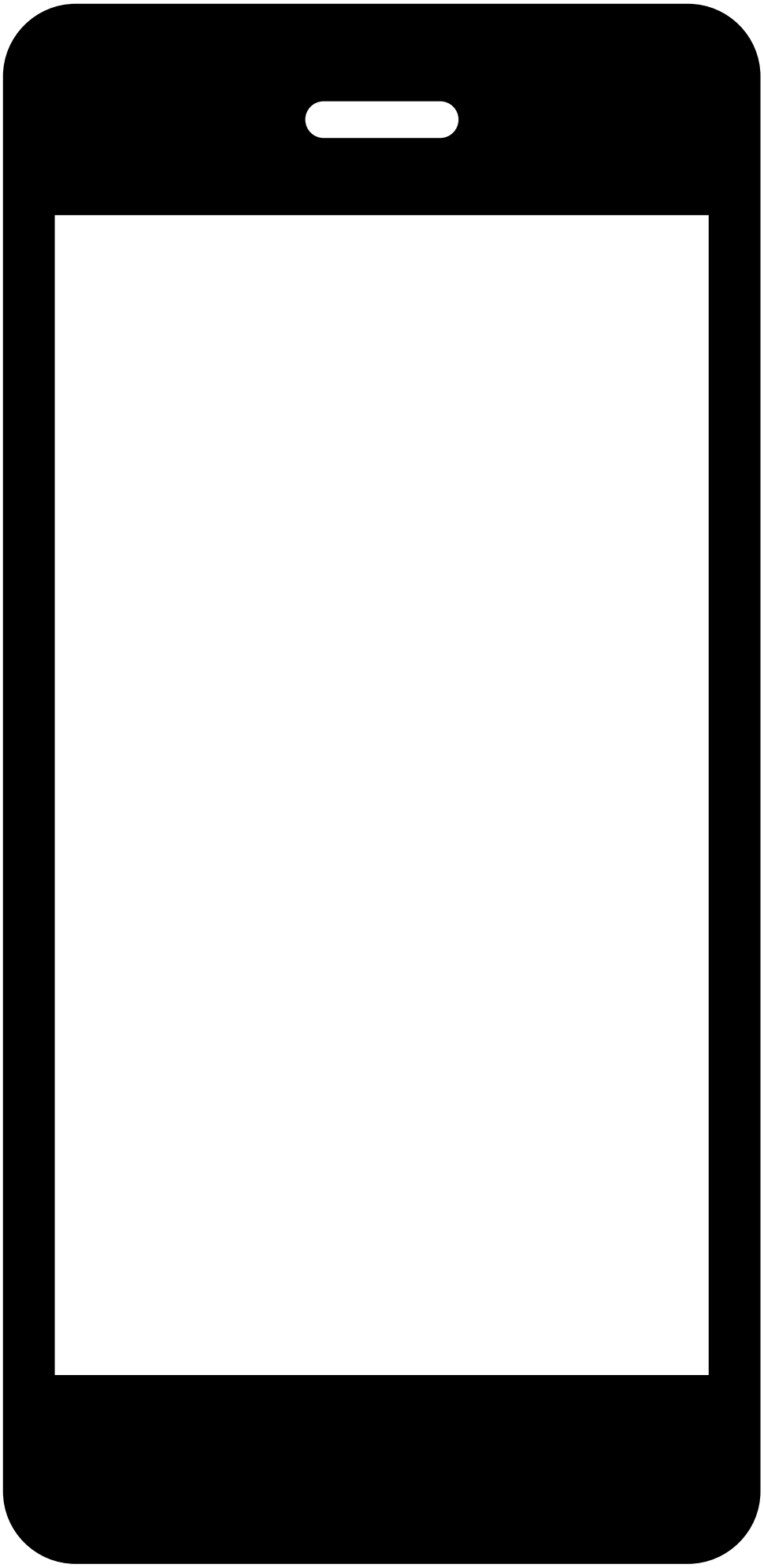

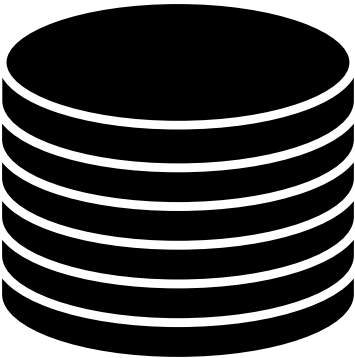

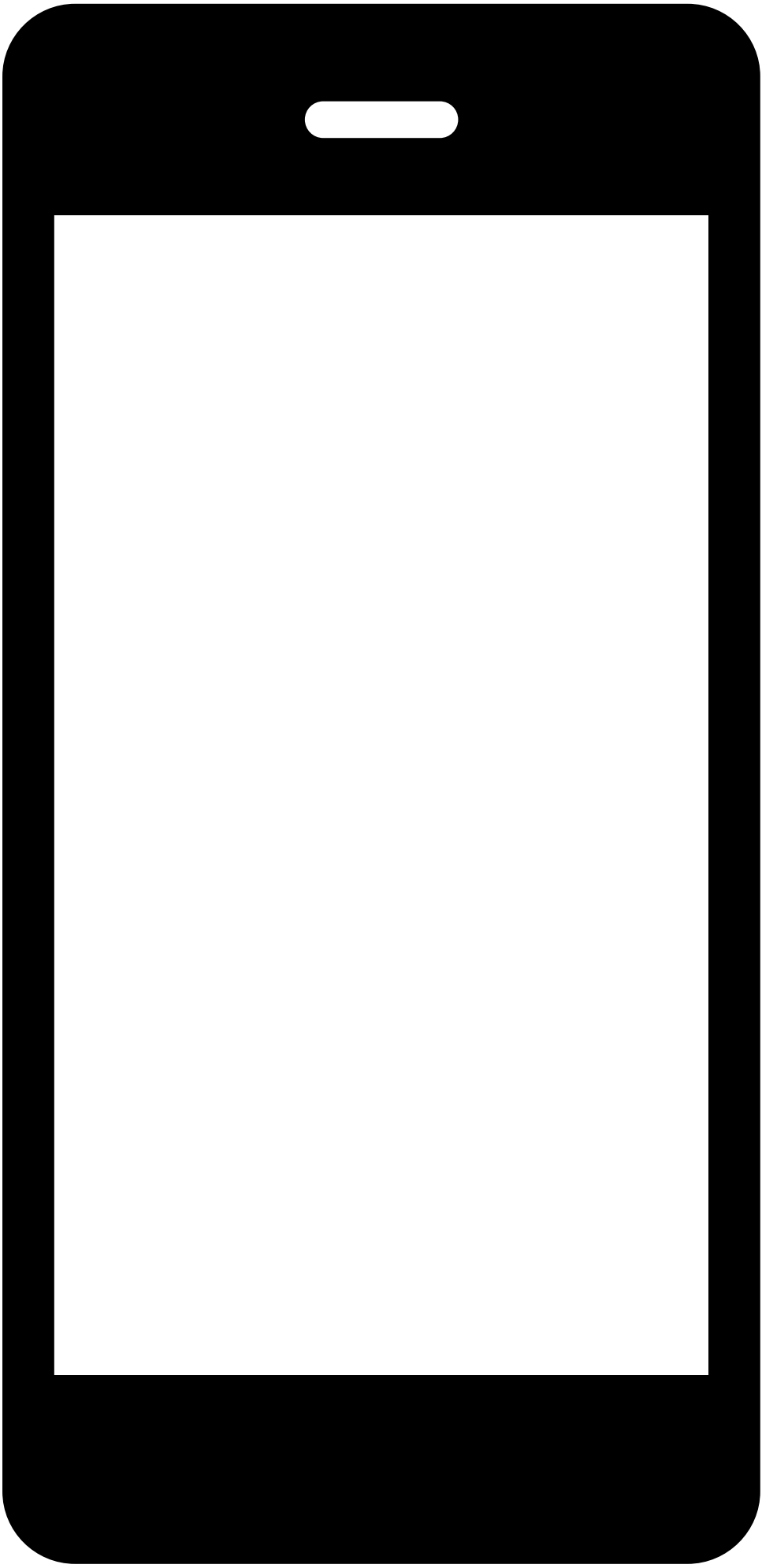

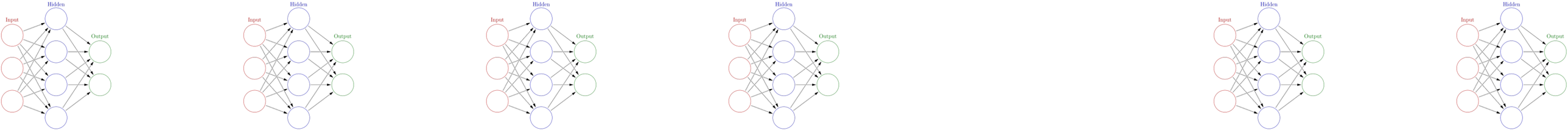
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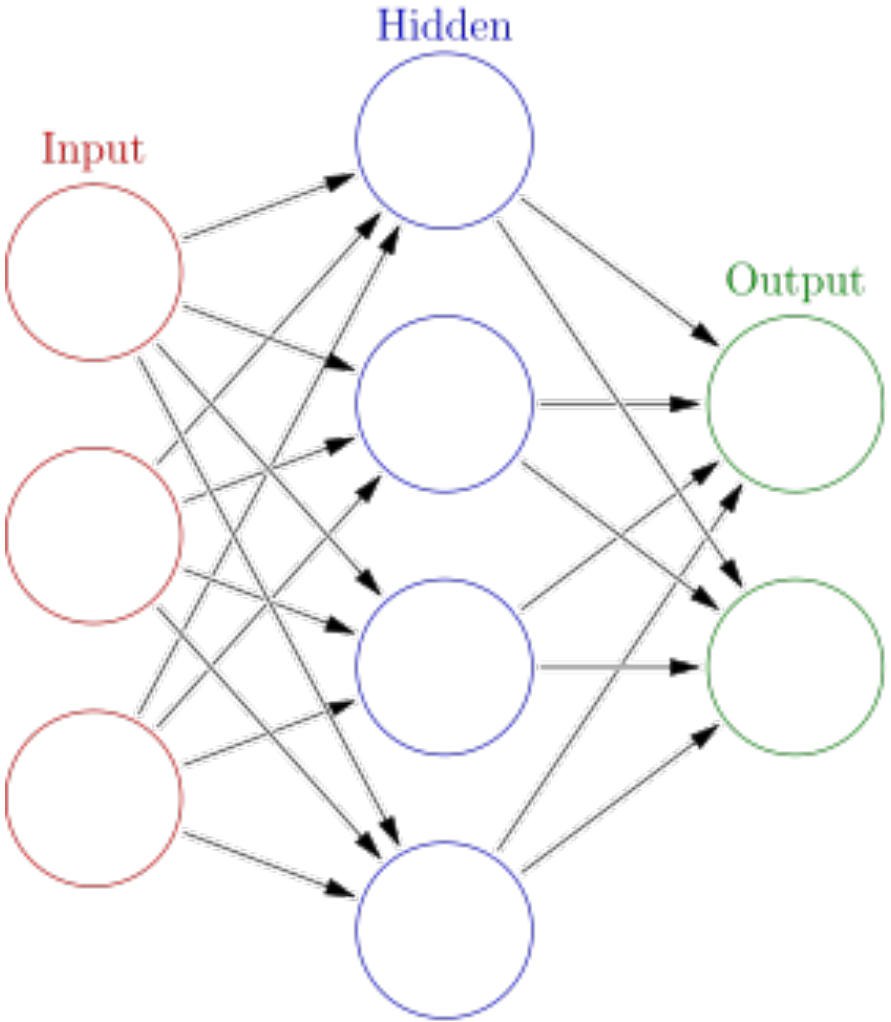
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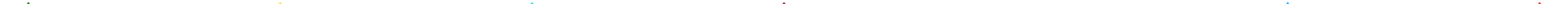

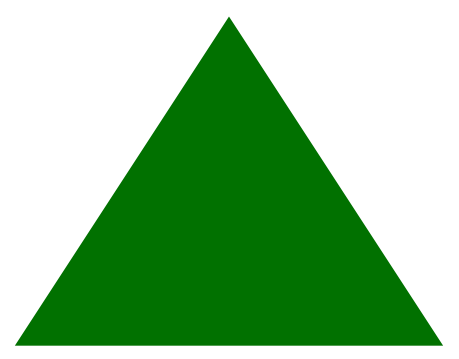

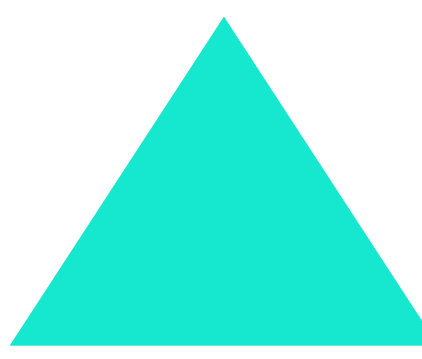

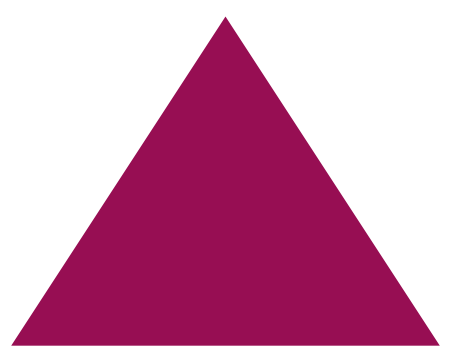

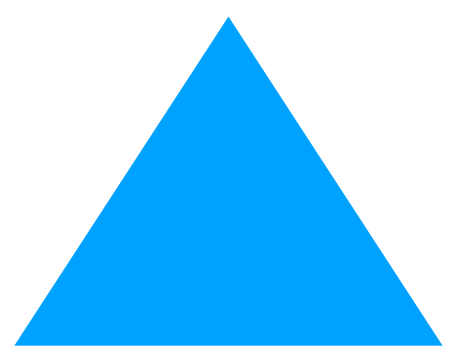

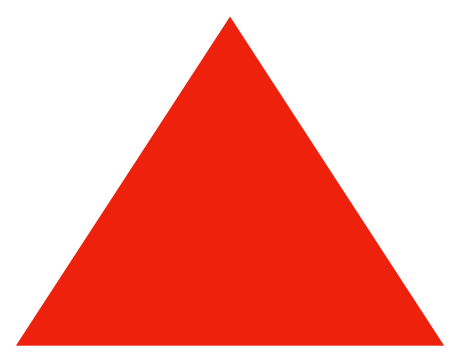

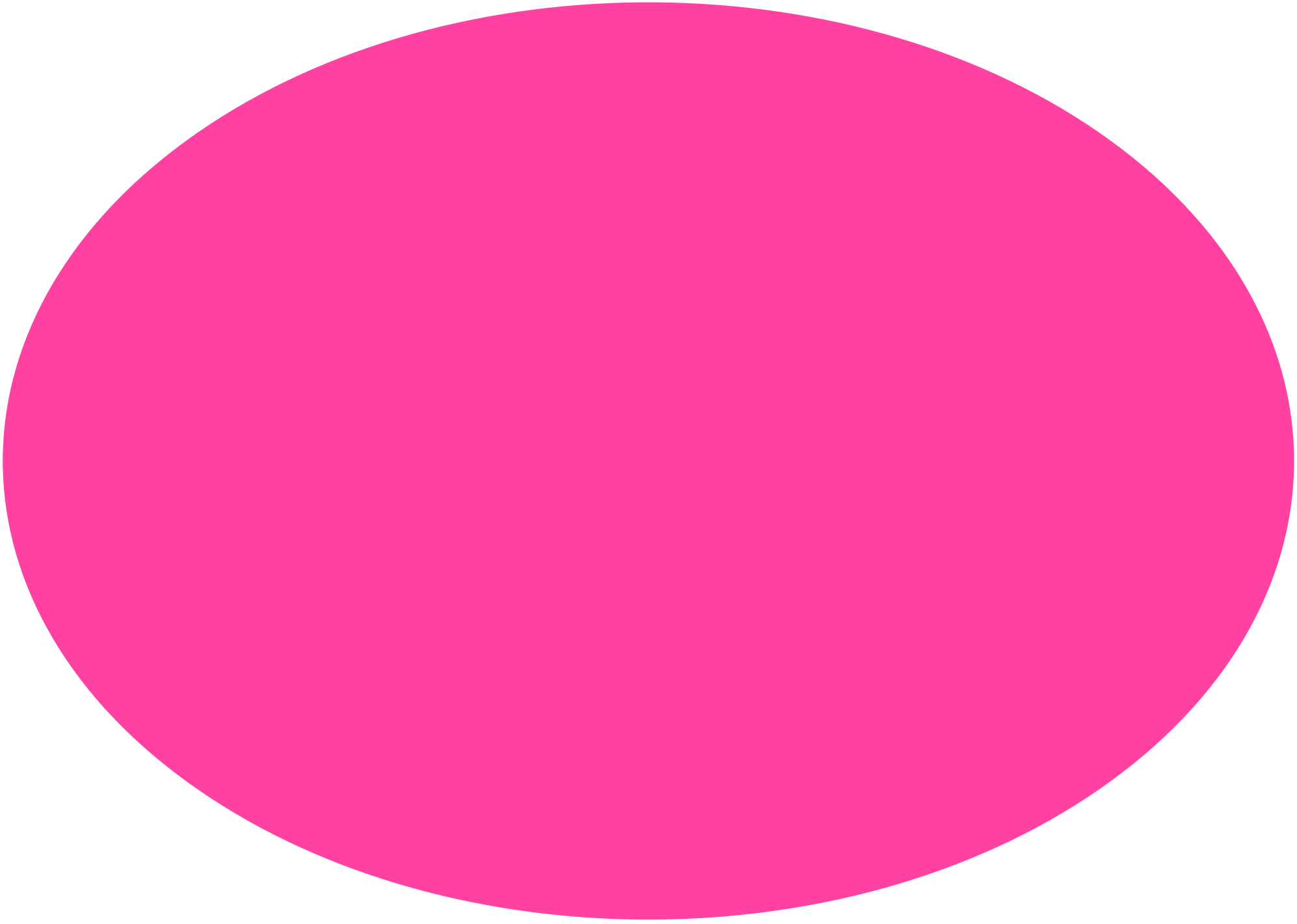

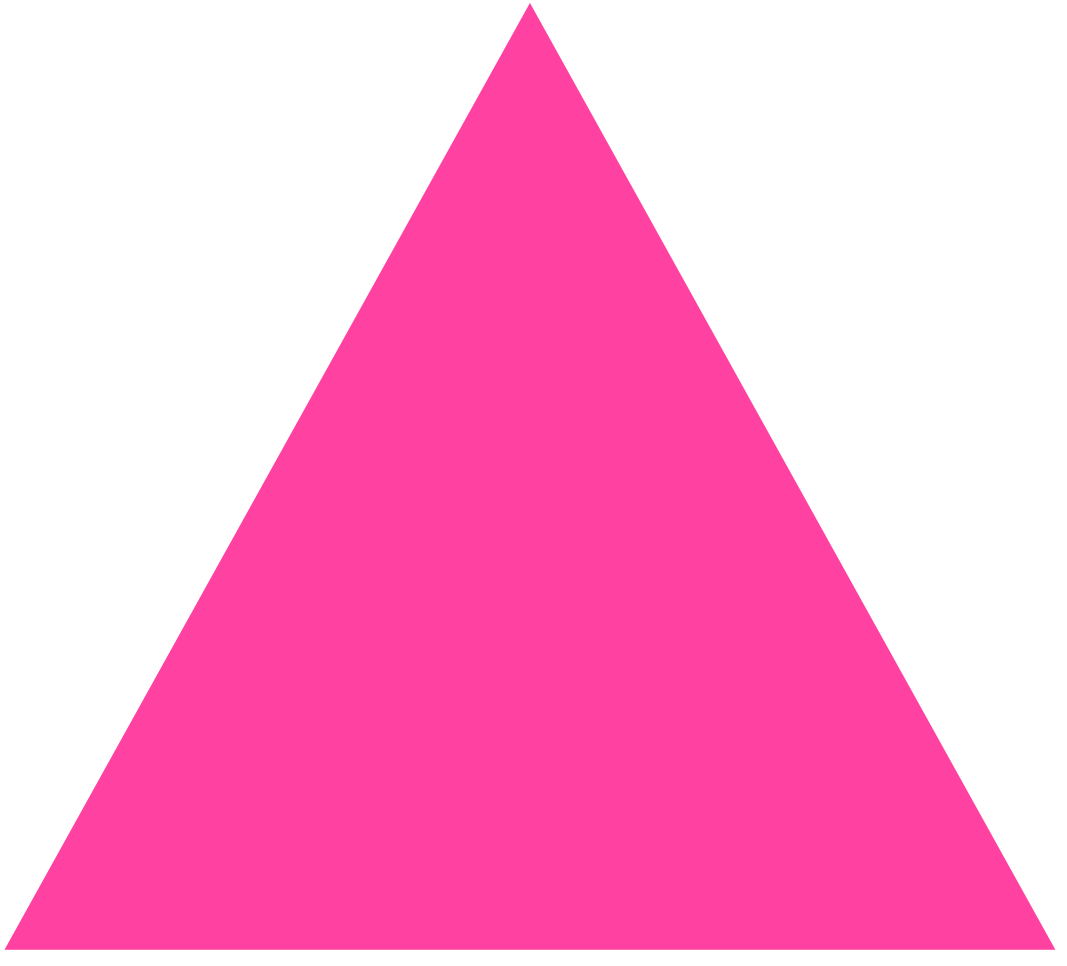

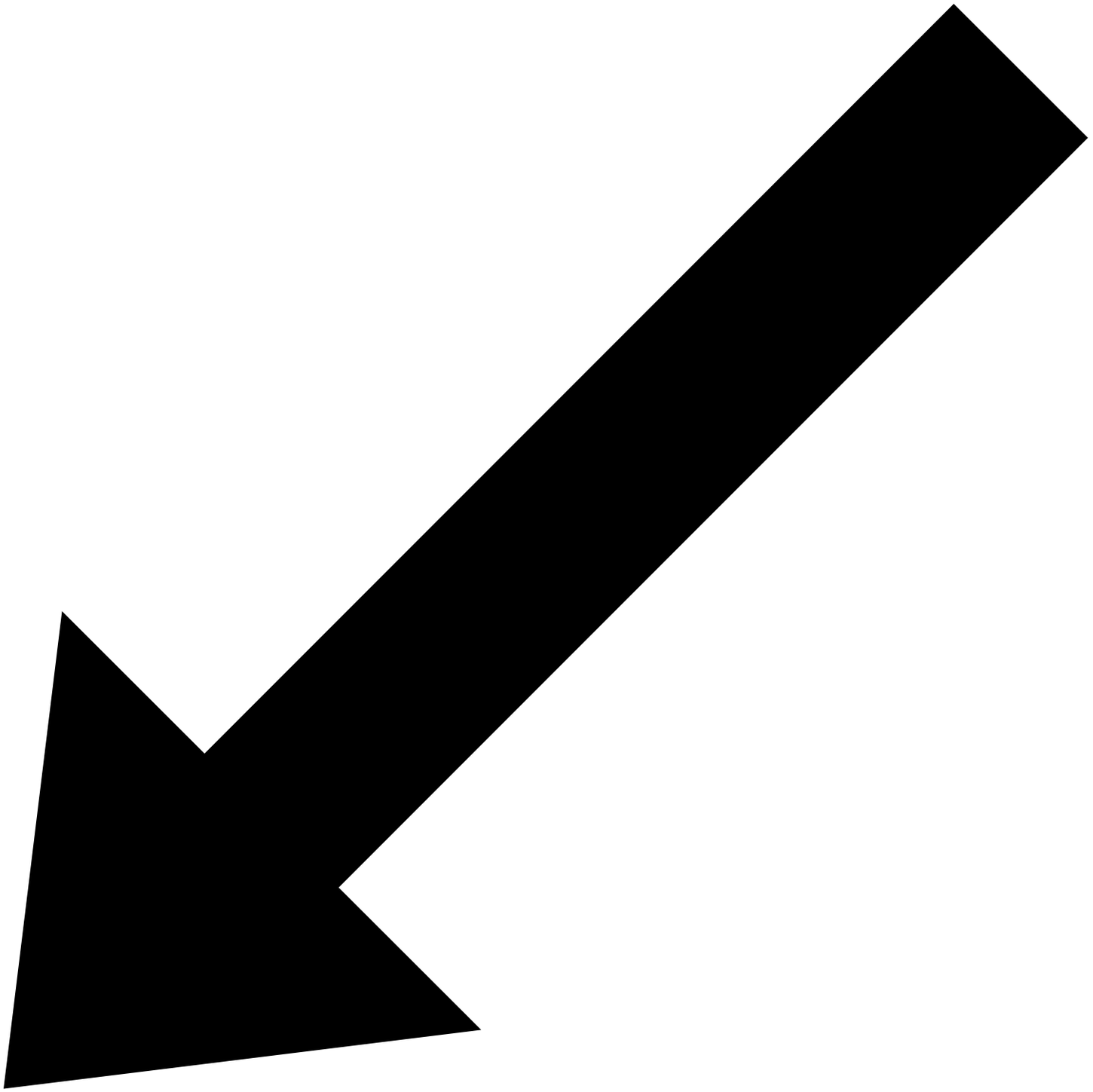

Iterate

Non-IID Setting

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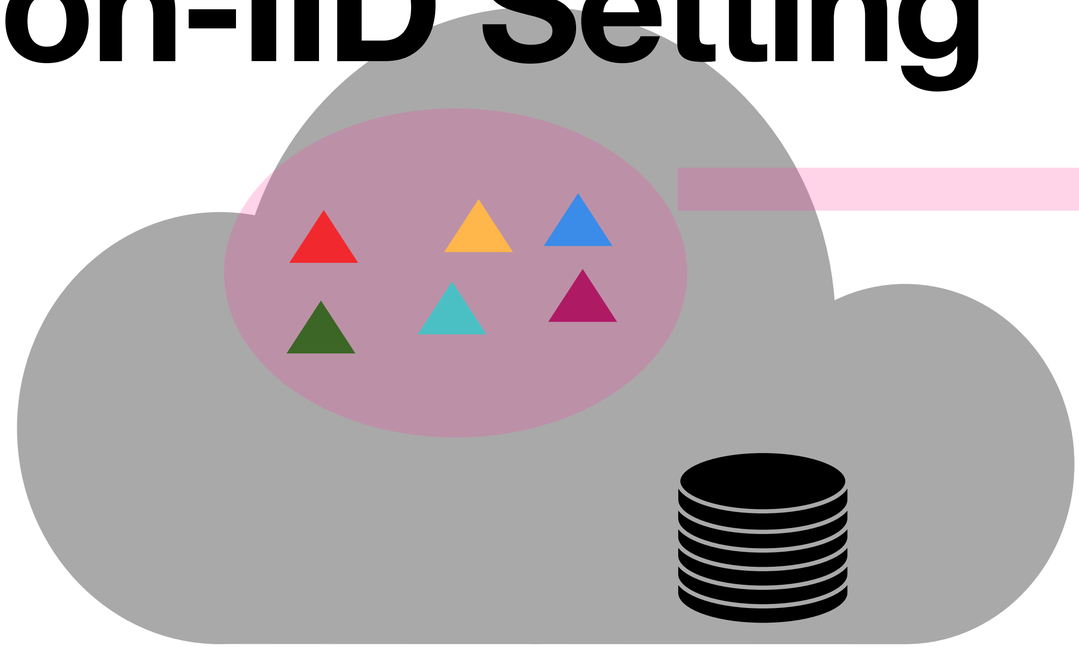
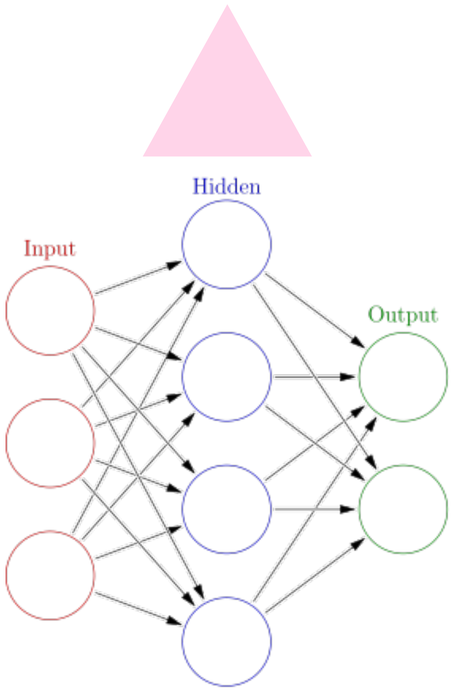
Non-IID Setting





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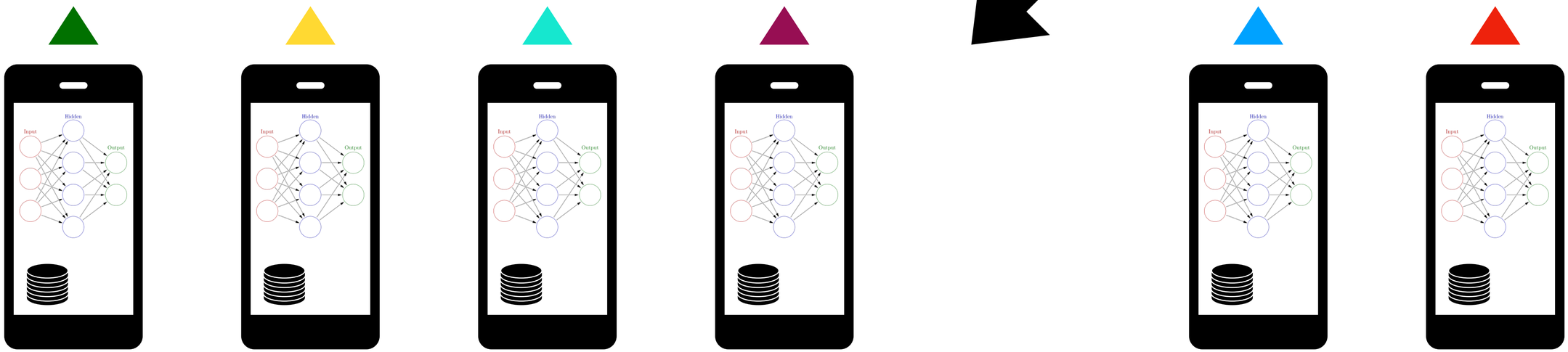

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Federated Optimization

Key properties different from a typical distributed optimization problem

- Non i.i.d
  - Local dataset will not be representative of the population distributio
- Unbalanced
  - Varying amounts of local training data
- Massively distributed
  - The number of clients is much larger than the number of examples per client
- Limited communication
  - Devices are frequently offline or on slow

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