

DynamoDB TTL

DynamoDB TTL

- Time To Live attribute defines an expiry time for your data
- Expired items marked for deletion
- Great for removing irrelevant or old data:
 - Session data
 - Event logs
 - Temporary data
- Reduces cost by automatically removing data which is no longer relevant





Session Data Table

userId	sessionId	creationTime	expirationTime(TTL)	sessionData
5346747	6734678235789	1544016418	1544023618	{JSON}
6478533	6732672579220	1544013196	1544020396	{JSON}
7579645	7657687845893	1544030827	1544038027	{JSON}
7695466	7857847689032	1544002027	1544009227	{JSON}

- TTL expressed as epoch time
- Expiration is set for 2 hours after the session began
- When the current time is greater than the TTL, the item will be expired and marked for deletion
- You can filter out expired items from your queries and scans

```
Fayes-iMac:~ fayeellis$ aws iam get-user
USER      arn:aws:iam::757250003982:user/faye 2018-05-15T13:14:23Z 2
018-11-16T10:24:38Z / AIDAILG04PJ77HX0IWHSA faye
Fayes-iMac:~ fayeellis$ aws dynamodb create-table --table-name SessionData --attribute-definitions \
> AttributeName=UserID,AttributeType=N --key-schema \
> AttributeName=UserID,KeyType=HASH \
> --provisioned-throughput ReadCapacityUnits=5,WriteCapacityUnits=5
TABLEDESCRIPTION      1544109940.69 0 arn:aws:dynamodb:us-east-1:757250003982:table/SessionData 22ec38c4-aaae-46d8-84ad-b28a3520b7b2 SessionData 0 CREATING
ATTRIBUTEDEFINITIONS  UserID N
KEYSCHEMA             UserID HASH
PROVISIONEDTHROUGHPUT 0 5 5
Fayes-iMac:~ fayeellis$ aws dynamodb batch-write-item --request-items file://items.json
Fayes-iMac:~ fayeellis$
```

Check IAM user permission

Create table

Populate the data

The screenshot shows the AWS Management Console for the 'SessionData' table. The 'Items' tab is selected, and the 'Actions' dropdown menu is open. The 'ExpirationTime' column in the table is highlighted with a red box. The table contains three items with their respective IDs, creation times, expiration times, and session IDs.

User ID	CreationTime	ExpirationTime	SessionId
5346747	1544016418	1544140800	6734678235789
6478533	1544013196	1544140800	6732672579220
7579645	1544030827	1544140800	7657687845893

Enable TTL

TTL is a mechanism to set a specific timestamp for expiring items from your table. The timestamp should be expressed as an attribute on the items in the table. The attribute should be a Number data type containing time in epoch format. Once the timestamp expires, the corresponding item is deleted from the table in the background.

TTL attribute

ExpirationTime

Enabling TTL can take up to 1 hour to apply across all partitions, and you will not be able to make further TTL changes until the action is complete. Please verify all information is correct to avoid loss of important data from your table.

DynamoDB Streams

☐ Enable with view type New and old images

Streams are currently not enabled

Enabling Streams gives a 24-hour backup window for TTL deleted items. Additional charges and Maximum Write Capacity Limit may apply.

Preview TTL

Before enabling TTL, it is recommended you run a preview to see samples of what items will be deleted once TTL is enabled on this table.

Run preview

preview items expiring by December 6, 2018

15

: 30

UTC

Cancel

Continue