

ADVANCED DATABASE MANAGEMENT
SYSTEMS LAB – db.collection.aggregate()

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db.collection.aggregate()

Definition

`db.collection.aggregate(pipeline, options)`

Calculates aggregate values for the data in a collection.

| Parameter | Type | Description |
|-----------|----------|---|
| pipeline | array | A sequence of data aggregation operations or stages. See the aggregation pipeline operators for details. The method can still accept the pipeline stages as separate arguments instead of as elements in an array; however, if you do not specify the pipeline as an array, you cannot specify the options parameter. |
| options | document | Optional. Additional options that <code>aggregate()</code> passes to the aggregate command. |

output

```
> db.purchase_orders.insertMany([{"product":"tooth paste",total: 4.75,customer:"Mike"}, {"product":"gitar",total: 199.99,customer:"Karan"}, {"product":"milk",total: 11.33,customer:"Mike"}, {"product":"pizza",total: 8.58,customer:"Binu"}])
{
  "acknowledged" : true,
  "insertedIds" : [
    ObjectId("614ec493b96898a118437e72"),
    ObjectId("614ec493b96898a118437e73"),
    ObjectId("614ec493b96898a118437e74"),
    ObjectId("614ec493b96898a118437e75")
  ]
}
```

purchase_orders.purchase_orders

DOCUMENTS 4 TOTAL SIZE 306B AVG. SIZE 77B INDEXES 1 TOTAL SIZE 20.0KB

Documents Aggregations Schema Explain Plan Indexes Validation

Full { field: "value" } OPTIONS FIND RESET

ADD DATA VIEW

Displaying documents 1 - 4 of 4

```

{ "_id": "6056c1107a34ec248448198d3435caf49",
  "product": "tooth paste",
  "total": 4.75,
  "customer": "Mike" }

{ "_id": "6056c1107a34ec248448198d3435caf49",
  "product": "gitar",
  "total": 199.99,
  "customer": "Karan" }

{ "_id": "6056c1107a34ec248448198d3435caf49",
  "product": "milk",
  "total": 11.33,
  "customer": "Mike" }

{ "_id": "6056c1107a34ec248448198d3435caf49",
  "product": "pizza",
  "total": 8.5,
  "customer": "Binu" }

```

```

> db.purchase_orders.aggregate([{$match: {} },{$group: {_id: "$customer", total: {$sum: "$total"}}}])
{ "_id" : "Mike", "total" : 16.08 }
{ "_id" : "Binu", "total" : 8.5 }
{ "_id" : "Karan", "total" : 199.99 }
>

```

```

> db.purchase_orders.aggregate([{$match: {} },{$group: {_id: "$product", total: {$sum: "$total"}}}])
{ "_id" : "gitar", "total" : 199.99 }
{ "_id" : "milk", "total" : 11.33 }
{ "_id" : "tooth paste", "total" : 4.75 }
{ "_id" : "pizza", "total" : 8.5 }
>

```

purchase_orders.purchase_orders

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COLLATION Untitled SAVE SAMPLE MODE AUTO PREVIEW

4 Documents in the Collection Preview of Documents in the Collection

Select an operator to construct expressions used in the aggregation pipeline stages. Learn more

```

{ "_id": "6056c1107a34ec248448198d3435caf49",
  "product": "tooth paste",
  "total": 4.75,
  "customer": "Mike" }

{ "_id": "6056c1107a34ec248448198d3435caf49",
  "product": "gitar",
  "total": 199.99,
  "customer": "Karan" }

{ "_id": "6056c1107a34ec248448198d3435caf49",
  "product": "milk",
  "total": 11.33,
  "customer": "Mike" }

{ "_id": "6056c1107a34ec248448198d3435caf49",
  "product": "pizza",
  "total": 8.5,
  "customer": "Binu" }

```

