

Q1. Find all the zip codes in Iowa state.

```
db.zipcode.aggregate([
    {$match:{state:"IA"}},
    {$group:{
        _id:{state:"$state"},
        zipcodes: {$addToSet: "$_id"}
    }}
]);
```

Q2. Find all the zip codes with a population less than 1000.

```
db.zipcode.aggregate([
    {$match:{pop: {$lt:1000}}},
    {$group:{_id:{state:"$state"},
        zipcodes: {$addToSet: "$_id"}
    }}
]);
```

Q3. Find all cities that have more than one zip code, sort the results based by state and city name.

```
db.zipcode.aggregate([
    {$group:{_id:{city:"$city",state:"$state"},
        num_zip:{$sum:1}}},
    {$match:{num_zip:{$gt:1}}},
    {$sort:{"_id.state":1,"_id.city":1}}
]);
```

Q4. Display the least populated city in each state

```
db.zipcode.aggregate([
    {$group:{_id:{state:"$state"},
        city:"$city",
        population:{$sum:"$pop"}}},
```

```
{ $sort: { "_id.state": 1, population: 1 } },  
{ $group: { _id: "$_id.state",  
            city: { $first: "$_id.city" },  
            population: { $first: "$population" } } }  
]);
```