

# Q1:JSON

## corrected JSON

```
{
  "students": [
    {
      "id": 101,
      "name": "Sarah Johnson",
      "courses": ["CS101", "MATH200", "ENG150"],
      "gpa": 3.85,
      "active": true,
      "graduation_date": null
    },
    {
      "id": 102,
      "name": "Alex Chen",
      "courses": ["CS101", "CS102", "STAT101"],
      "gpa": 3.92,
      "active": true,
      "advisor": null,
      "notes": "Excellent student with strong analytical skills"
    },
    {
      "id": 103,
      "name": "Maria Rodriguez",
      "courses": [],
      "gpa": 3.67,
      "active": false,
      "special_programs": ["honors", "research"]
    }
  ],
  "last_updated": "2024-09-15T10:30:00Z",
  "total_students": 3
}
```

## Errors and Fix

- **Error:** Multiple top-level { ... } objects.  
**Fix:** Wrap them in one root, e.g. {"students": [ {...}, {...}, {...} ]}.
- **Error:** Missing comma after "id": 102 .  
**Fix:** add , → "id": 102,

- **Error:** Missing comma between "CS101" and "CS102" .  
**Fix:** ["CS101", "CS102", "STAT101"]
- **Error:** True (capital T) is invalid JSON.  
**Fix:** use true .
- **Error:** undefined is not allowed in JSON.  
**Fix:** use null or remove the field, e.g. "advisor": null .
- **Error:** Missing comma between objects in an array ( } followed immediately by { ).  
**Fix:** add , between objects: }, {
- **Error:** Trailing comma after last property in an object.  
**Fix:** remove the trailing comma.
- **Error:** Stray ] /unmatched brackets because array was never opened.  
**Fix:** ensure [ is added where needed and brackets match the array.
- **Error (minor):** Inconsistent id types ( "103" is string while others are numbers).  
**Fix:** make them consistent, e.g. "id": 103 .

## Q2:TOML

- 2 feature flags.** new\_ui is active ( enabled = true ), analytics is inactive.
- Log rotates** when it hits 100MB (a new file is started; exact backup behavior depends on the logging tool).
- Change** host = "0.0.0.0" to host = "127.0.0.1" (or "localhost" ).
- 3600 seconds** (which is 1 hour).
- [feature\_flags] = one table; [[feature\_flags]] = an array of tables (use [...] to define multiple flags).