API testing

API: GET /events

Pentru a verifica corectitudinea API-ului de obtinerea a tuturor evenimentelor(request-ul de obtinere a evenimentelor existente intoarce ceea ce ne asteptam) in cazul de fata (we already know we have 12 events 😊)) putem verifica ca raspunsul contine 12 evenimente, iar status code-ul este 200.

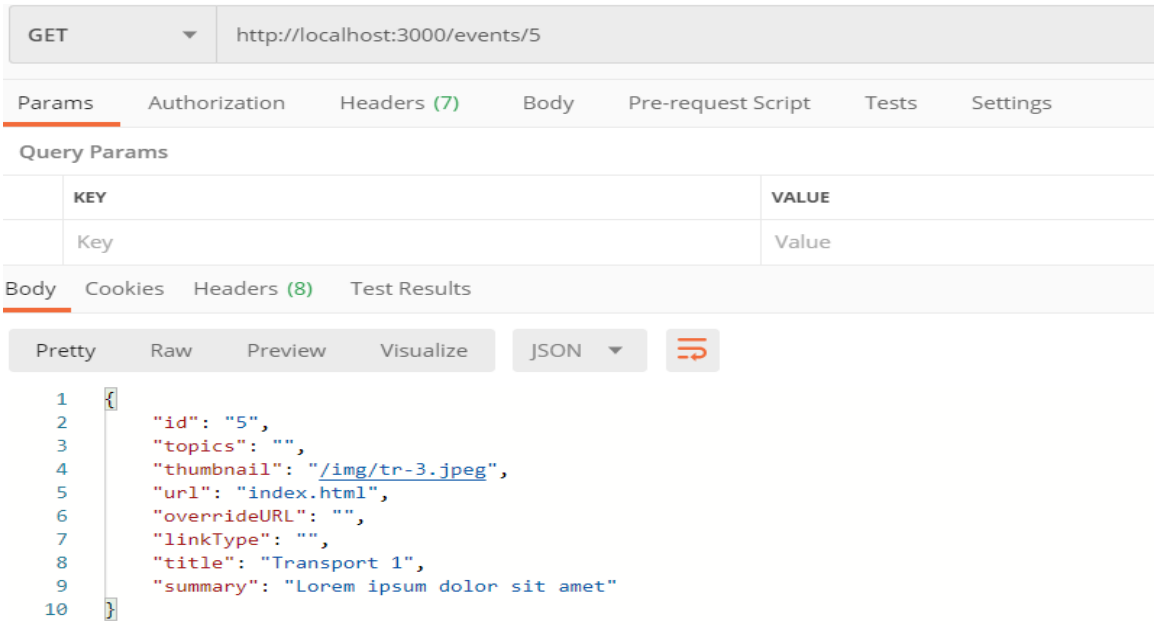
Dupa cum putem observa, API-ul functioneaza corect, deoarce rezultatul intors este cel astepat (12 evenimente), iar structura fiecarui eveniment este cea din descrierea oferita de developer.

API: GET /events/:id

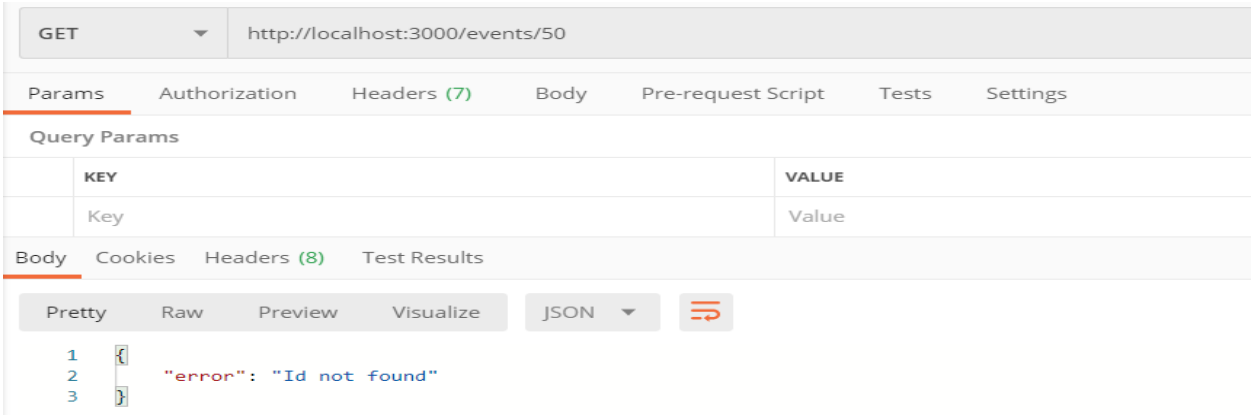
Pentru a valida faptul ca acest API functioneaza corect, trebuie sa testam cele doua cazuri posibile:

1. id-ul furnizat identifica un eveniment existent in “baza de date”
2. id-ul furnizat este invalid.

Pentru primul caz utilizam un id (folosim id-ul unui eveniment din cele 12; avem acces la id-uri, deoarece am considerat ca API-ul precedent functioneaza corect).



Pentru cazul in care id-ul este invalid, raspunsul ar trebui sa reflecte acest lucru. Let’s test and see the result.



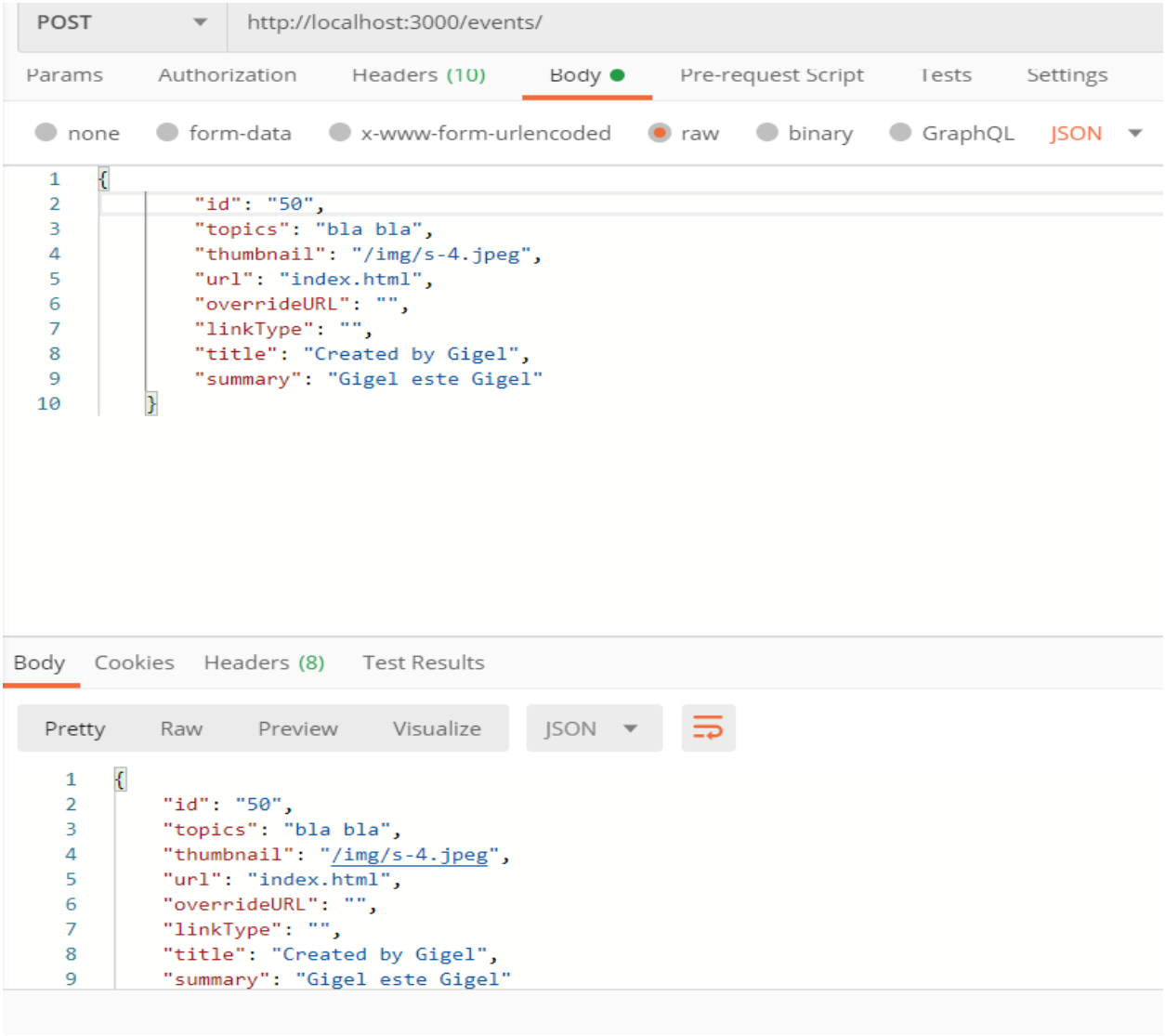
API: POST /events

In cazul acestui API avem 5 cazuri:

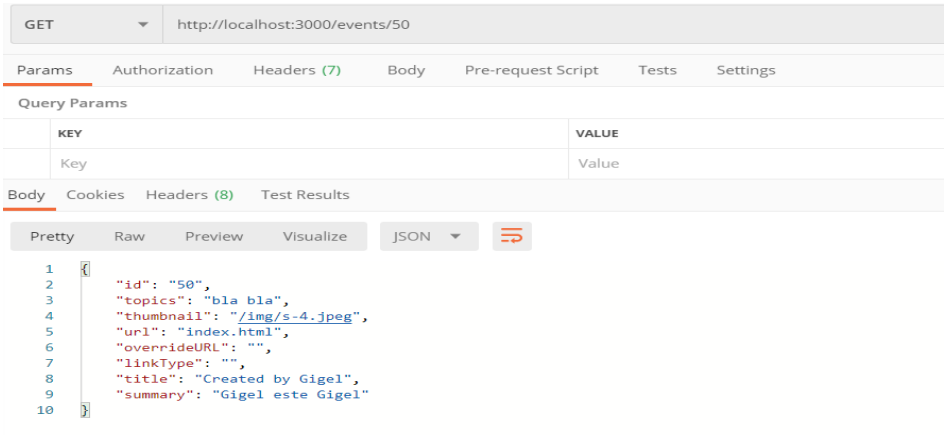
1. incercam sa creeam un eveniment cu toate datele necesare
2. incercam sa creeam un eveniment cu toate datele, mai putin campul id.
3. incercam sa creeam un eveniment cu valori invalide pentru anumite campuri.
4. incercam sa creeam un eveniment cu unele campuri lipsa (diferite de id)
5. incercam sa cream un eveniment cu un id deja existent (care identifica o resursa existenta).

Pentru primul caz flow-ul de testare este urmatorul:

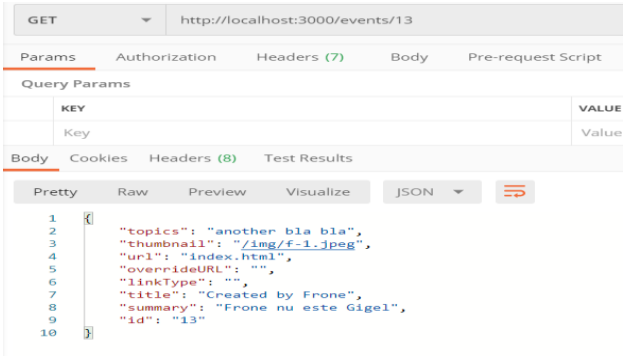
- facem request-ul de crearea a unui nou eveniment



- verificam daca noul eveniment exista in “baza de date” folosind API-ul de obtinere a unui eveniment identificat prin id-ul sau.

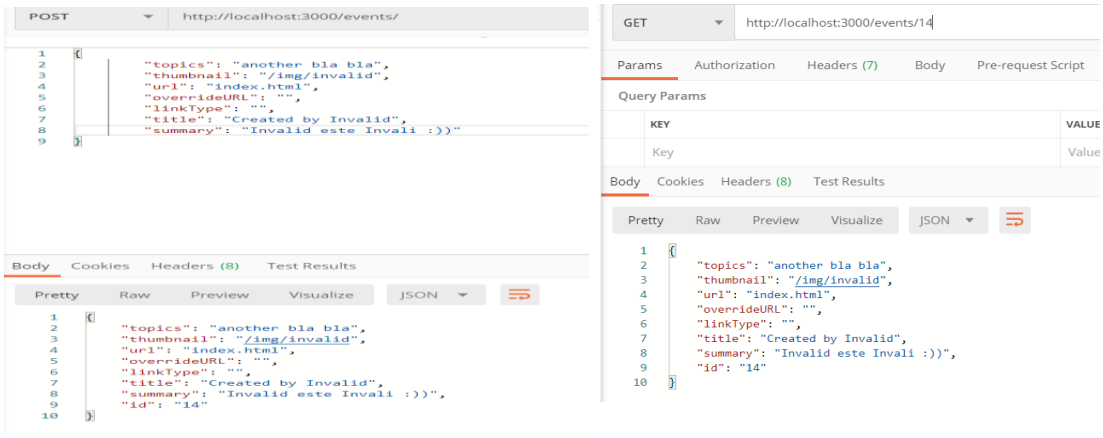


Pentru cel de-al doilea caz urmam aceeasi pasi ca mai sus (doar ca de data aceasta nu vom mai furniza id-ul):



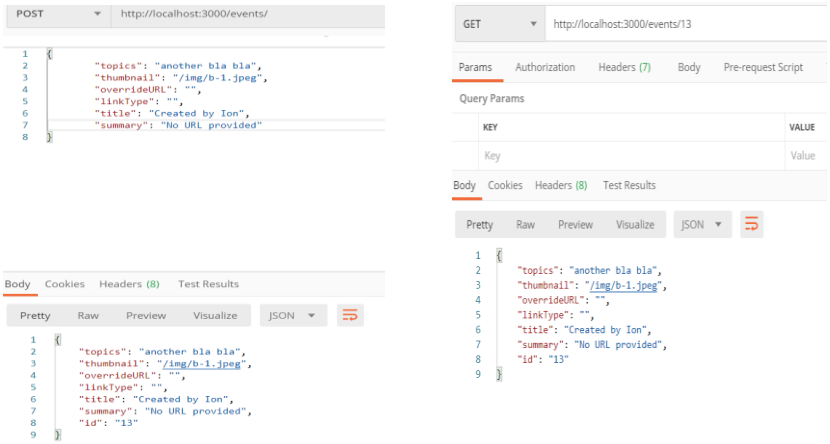
Dupa cum putem observa, aplicatia creeaza un nou eveniment chiar daca nu am furnizat un id.

Pentru cazul al treilea, vom incerca sa creeam un eveniment care contine o valoare invalida pentru campul ‘thumbnail’. De asemenea, vom urma pasii de la celelate doua cazuri:



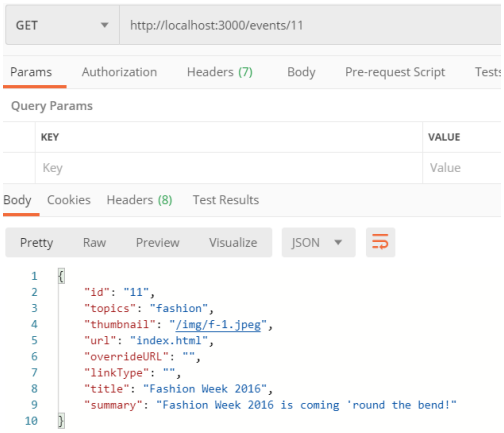
Se poate observa ca evenimentul este creat cu success, ceea ce insemana ca aplicatia nu face validarea datelor, deci va trebui sa semnalam un bug 😊).

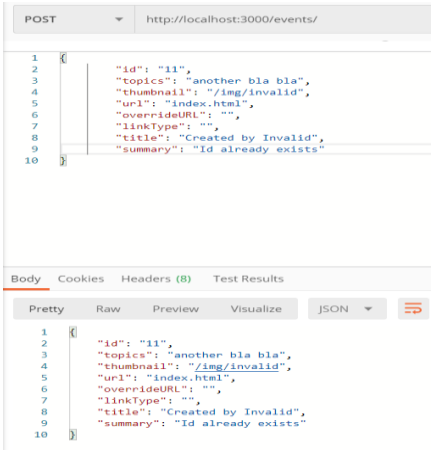
Pentru cel de-al patrulea caz urmam aceeasi pasi, dar nu vom furniza campul ‘url’ cand vom face request-ul de creare:

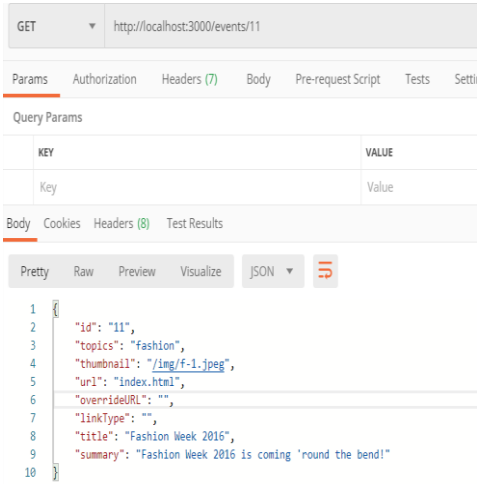


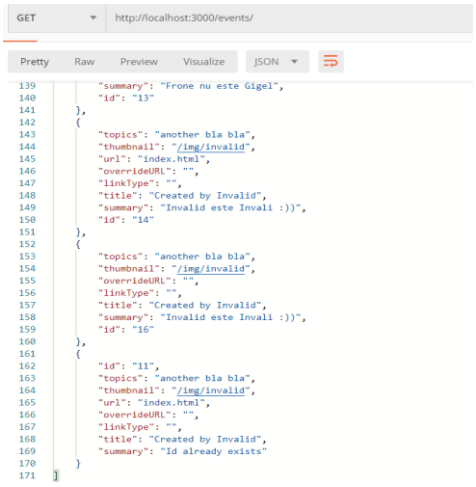
Din nou putem observa ca aplicatia creeaza un nou eveniment, chiar daca unul dintre campuri lipseste; probabil acel camp este optional sau mai dagraba aplicatia nu face validarea datelor (eu pariez pe aceasta optiune 😊)).

Pentru ultimul caz, urmam aceeasi pasi ca mai sus, la care adaugam pasul de verificare a resursei identificata prin id-ul ales:









Dupa cum se poate observa, din nou, aplicatia creeaza un nou eveniment cu un id care deja identifica o resursa. Din nou putem afirma ca aplicatia nu face validarea datelor.

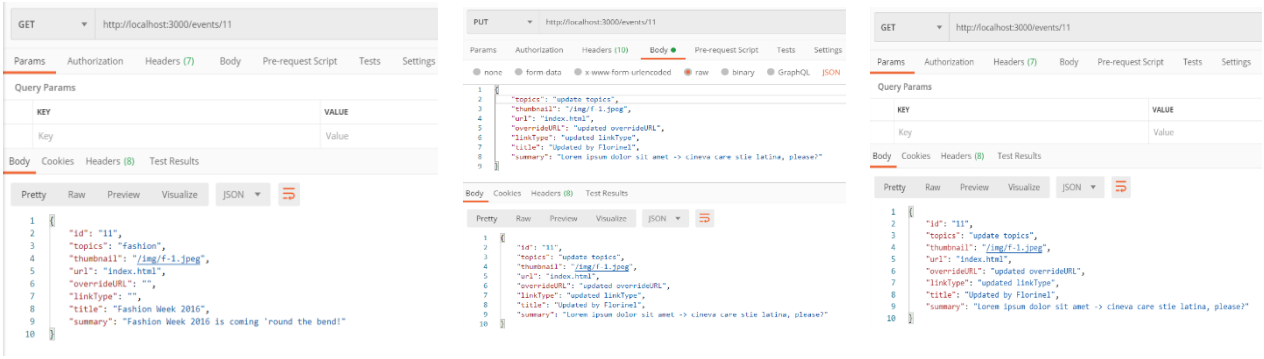
P.S: eu am presupus ca acel camp id este un identificator unic pentru o resursa.

API: PUT /events/:id

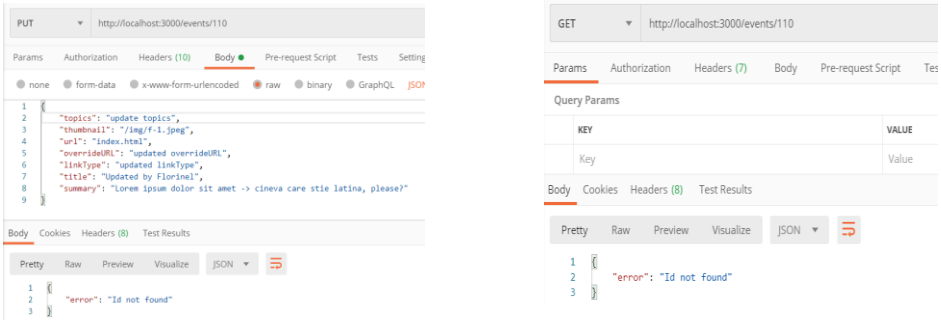
In cazul acestui API, va trebui sa verificam urmatoarele doua cazuri de baza (cazurile cu date lipsa/invalide le-am testat in cadrul API-ului de creare a unei noi resurse si am observat ca aplicatia nu face validarea datelor):

1. actualizarea unei resurse identificata printr-un id valid.
2. actualizarea unei resurse inexistente in “baza de date” (utilizam un id invalid)

Pentru primul caz vom face request-ul de update, iar mai apoi vom verifica ca resursa a fost actualizata corespunzator:



Pentru cel de-al doilea caz, vom urma acelasi flow, dar de data aceasta ne asteptam ca server-ul sa ne intoarca o eroare deoarece event-ul nu exista.



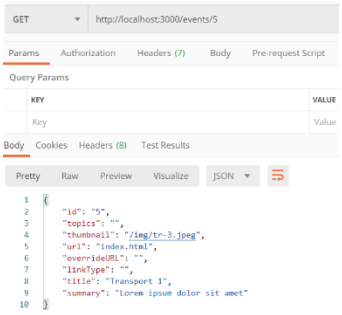
Dupa cum putem observa, in acest caz, server-ul ne rasounde cu un mesaj de eroare(care reflecta faptul ca resursa nu exista in “baza de date”).

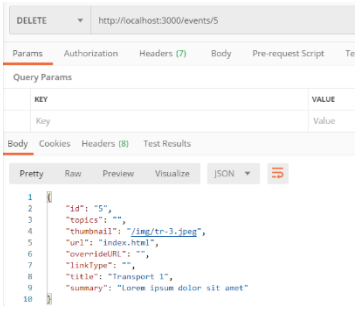
API: DELETE /events/:id

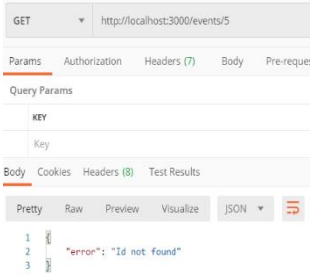
De asemenea, pentru acest API, va trebui sa testam comportamentul sau pentru cele doua cazuri tratate in caul API-ului de update, si anume:

1. stergerea unui eveniment existent in baza de date -> id valid
2. stergerea unui eveniment inexistent in baza de date -> id invalid

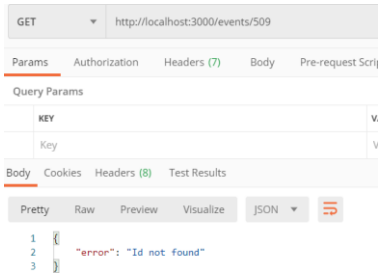
Pentru primul caz, vom face requeus-tul de stergere a unei resurse existente, iar mai apoi vom verifica ca respectiva resursa nu se mai gaseste in “baza de date”.

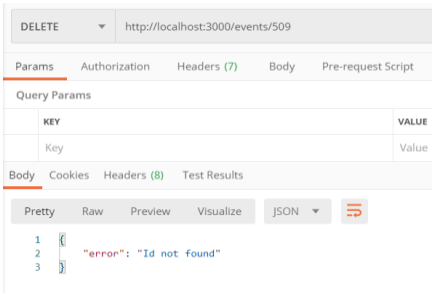






Aceasi pasi ii vom urma si pentru cazul al doilea (evenimentul nu exista in “baza de date”).





Dupa cum putem observa, in acest caz, server-ul ne raspunde cu un mesaj de eroare sugestiv. Totusi, in cazul acesta, server-ul ar fi trebui sa raspunda cu un mesaj de genul: “Event was deleted successfully”.