



# INFORMATIKOS FAKULTETAS

## **T120B165 Saityno taikomųjų programų projektavimas**

### **Projekto „Nuolaidauk“ ataskaita**

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# **1. Sprendžiamo uždavinio aprašymas**

## **1.1. Sistemos paskirtis**

Projekto tikslas – palengvinti didžiųjų tinklų apsipirkinėtųjų darbą, leidžiant vartotojams sužinoti apie esamas nuolaidas skirtingose maisto prekių parduotuvėse.

Veikimo principas – pačią kuriamą platformą sudaro dvi dalys: internetinis apps'as, kuria naudosis vartotojai, moderatorius, administratorius bei aplikacijų programavimo sąsaja (angl. trump. API).

Vartotojas, norėdamas naudotis šia platforma, turės prisiregistruoti prie internetinės aplikacijos ir galės pasirinkti savo norimus parduotuvių tinklus, apie kuriuos nori gauti pranešimus, jog programėlėje yra naujos nuolaidos. Gali susikurti pirkinių sąrašą kuris bus išskaidytas į skirtingas parduotuves (jeigu tokių yra). Gali pridėti specifinių parduotuvių nuolaidas kurias turės patvirtinti moderatoriai. Moderatoriai gali atlikti CRUD operacijas ant specifinių parduotuvių nuolaidų kurios buvo pateiktos patvirtinimui, modifikuoti esamas. Administratoriai gali manipuluoti nuskaitytas ir įdėtas prekes į sistemos duombazę.

## **1.2. Funkciniai reikalavimai**

### **Neregistruotas sistemos naudotojas galės:**

1. Peržiūrėti platformos reprezentacinį puslapį;
2. Registruotis prie internetinės programėlės.

### **Registruotas sistemos naudotojas galės:**

1. Prisijungti prie internetinės programėlės;
2. Atsijungti nuo internetinės programėlės;
3. Prisidėti norimų parduotuvių sąrašą:
  - a. Modifikuoti prisidėtų parduotuvių sąrašą;
4. Matyti pagal parduotuvių tinklus esamas prekes parduotuvės tinkle:
  - a. Išsisaugoti prekę į krepšelį;
  - b. Pridėti prekę į „patinkančių“ sąrašą;
  - c. Pranešti apie prekės neatitikimą;

- d. Pranešti apie nuolaidos neatitikimą;
- 5. Sukurti specifinės parduotuvės nuolaidą:
  - a. Nurodyti parduotuvės tinklą;
  - b. Pasirinkti parduotuvės tinklo adresą;
  - c. Nurodyti nuolaidos tipą:
    - i. Visos prekės;
    - ii. Specifinė kategorija;
    - iii. Specifinė prekė;
  - d. Nurodyti nuolaidos dydį;
  - e. Nuolaidos galiojimo pradžią;
  - f. Nuolaidos galiojimo pabaigą;
- 6. Valdyti savo susidėtų prekių krepšelius:
  - a. Ištrinti krepšelį;
  - b. Keisti įsidėtų prekių kiekius;
  - c. Ištrinti parduotuvės tinklo prekes;
  - d. Uždaryti krepšelį;
- 7. Peržiūrėti savo krepšelių istoriją;
- 8. Peržiūrėti prekės kainos istoriją.

**Moderatorius galės:**

- 1. Patvirtinti naudotojų sukurtas specifines nuolaidas;
- 2. Ištrinti naudotojų sukurtas specifines nuolaidas;

**Administratorius galės:**

- 1. Modifikuoti esamas prekių nuolaidas;

2. Ištrinti esamas prekes;
3. Modifikuoti kategorijas;
4. Modifikuoti prekių kategoriją;
5. Ištrinti registruotus vartotojus;

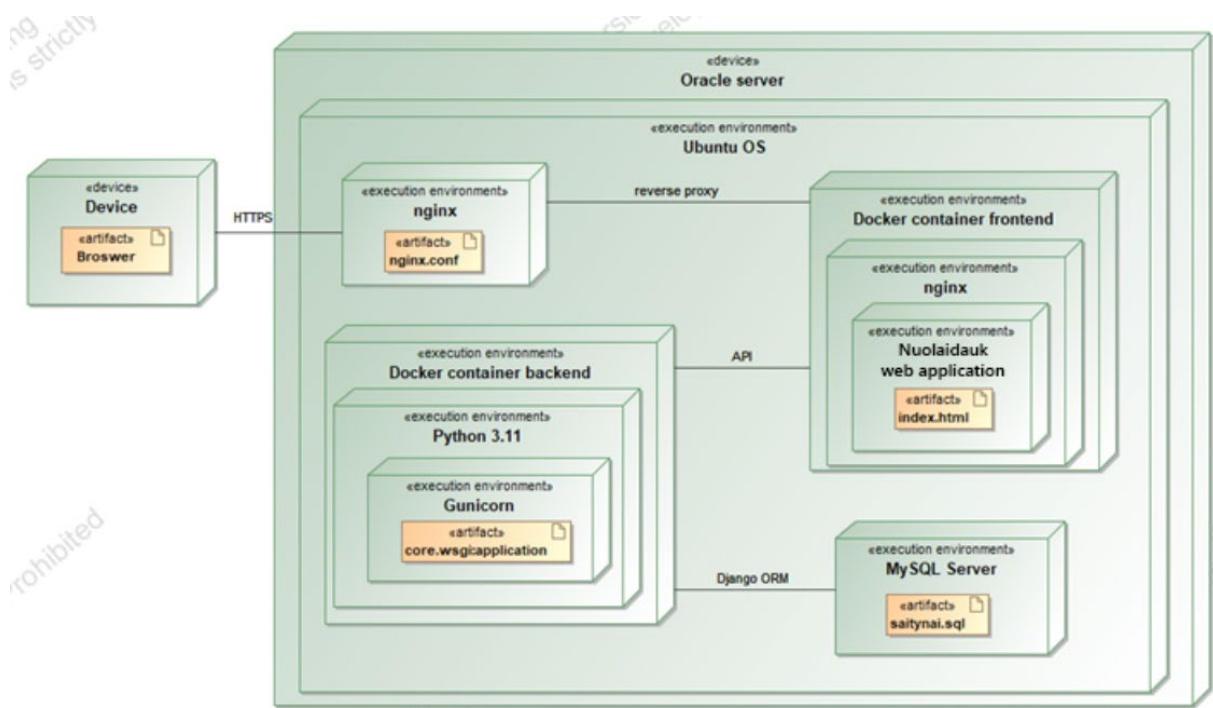
## 2. Sistemos architektūra

Sistemos sudedamosios dalys:

- Kliento pusė (ang. Front-End) – naudojant Angular;
- Serverio pusė (angl. Back-End) – naudojant Python – DRF (Django Rest Framework).
- Duomenų bazė (angl. Database) –naudojant MySQL technologiją.

2.1 pav. pavaizduota kuriamos sistemos diegimo diagrama. Sistemos talpinimui yra naudojamas Azure serveris. Kiekviena sistemos dalis yra diegiama tame pačiame serveryje.

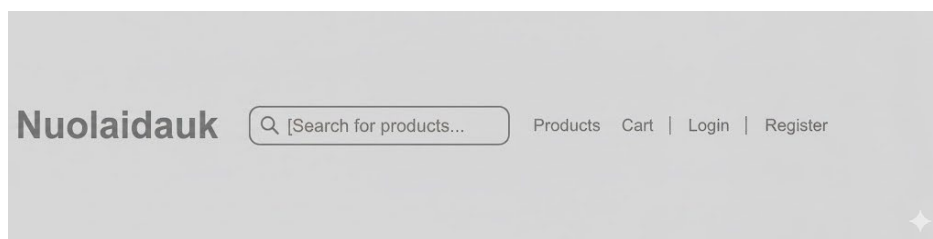
Internetinė aplikacija yra pasiekama per HTTP protokolą. Šios sistemos veikimui (pvz., duomenų manipuliavimui su duomenų baze) yra reikalingas Nuolaidauk API, kuris pasiekiamas per aplikacijų programavimo sąsają. Nuolaidauk API naudoja ORM biblioteką, kuri programos kodą paverčia SQL užklausomis. Šios užklausos yra vykdomos tiesiogiai SQLite duomenų bazės faile, nenaudojant atskiro serverio



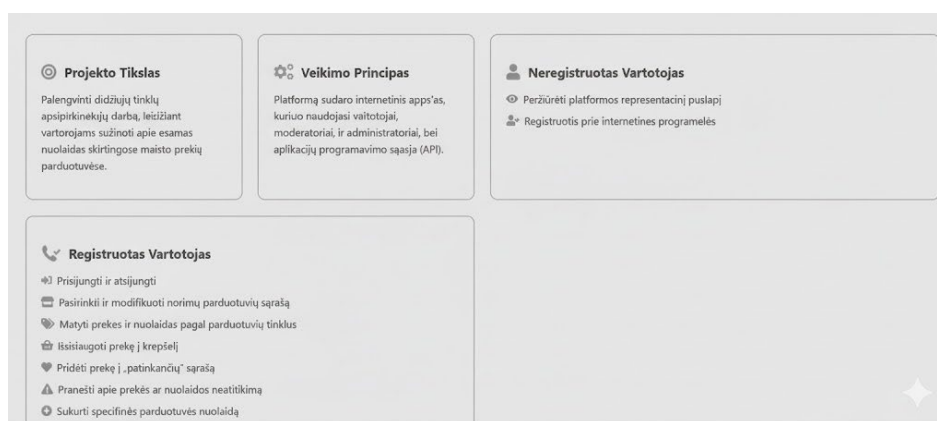
2.1 pav. Sistemos Nuolaidauk diegimo diagrama

## 3. Naudotojo sąsaja

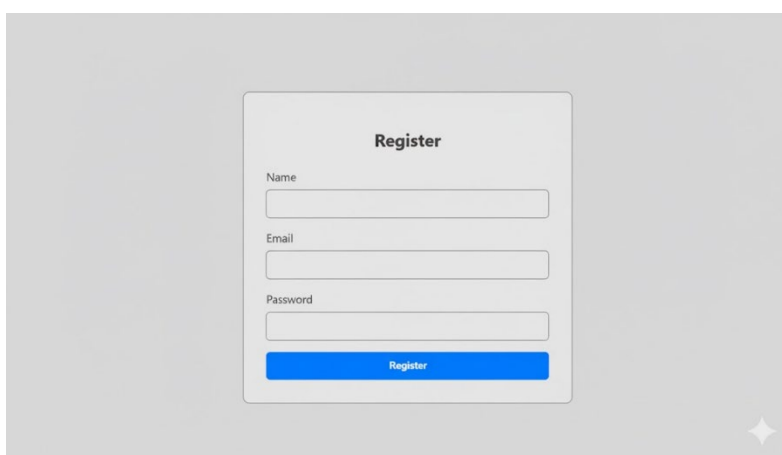
### 3.1. Wireframes



pav. 3.1 Antraštė (angl. header)



pav. 3.2 Pagrindinis puslapis (svečiams)



pav. 3.3 Registracijos puslapis

**Login**

Email

Password

Login

pav. 3.4 Prisijungimo puslapis

Min Price: Max Price: Brand: Category: Sort by:

Min Price: Max Price: All All Default Apply Reset

10 V akumulianame

Price: 29.90 €  
Discount Price: 61.90 €

View Details Add to Cart

10 V akumulianame

Price: 29.90 €  
Discount Price: 69.90 €

View Details Add to Cart

20 V akumuliatorinis kampptoklis PWSA 20-Li

Price: 39.90 €  
Discount Price: 39.90 €

View Details Add to Cart

pav. 3.5 Produktų puslapis

**Shopping Cart** Close cart

**LIDL**

20 V akumuliatorinis kampptoklis PWSA 20-Li  
3200.00 €13.99 + 4 Purchased Remove

**MAXIMA**

Alytusis šokoladas ROSHEN BUBBLEY, 3 nūsių, 80 g  
€0.00 €1.89 + 1 Purchased Remove

Ekologiškas mačios rinkinys MDOYA DAILY su šauktele\*, 240 g, 1 rink.  
€3.00 €7.89 + 1 Purchased Remove

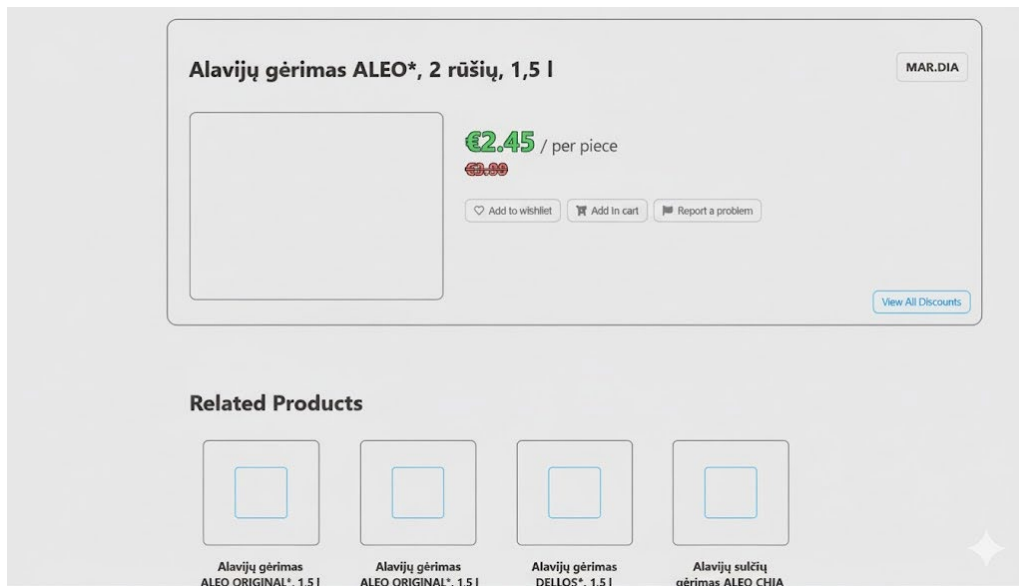
**RIMI**

Riektos sūdo tortas Skanumėlis (metas), 1 kg  
€16.99 + 1 Purchased Remove

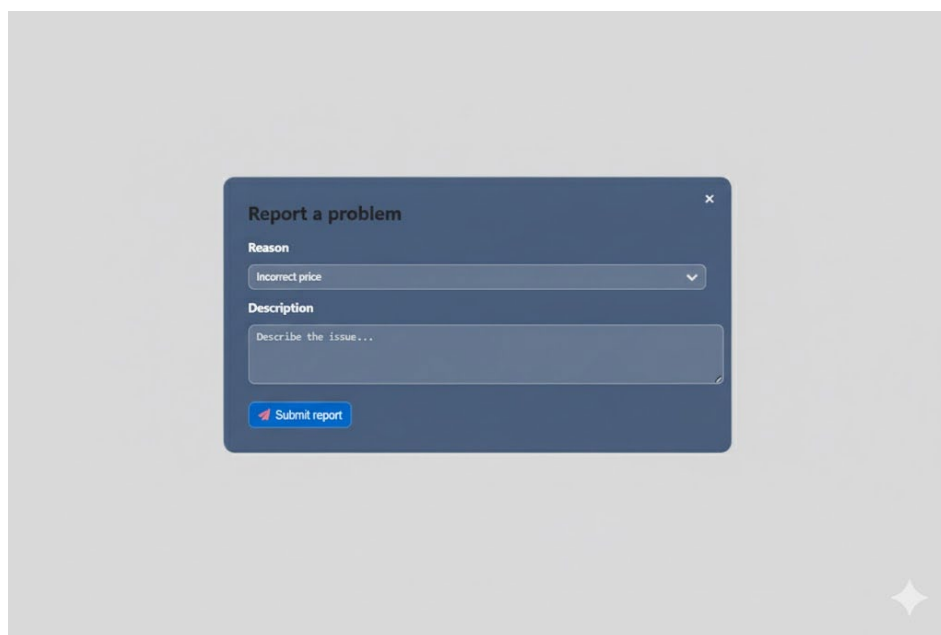
**Closed carts**  
No closed carts yet. Apply

pav. 3.6 Krepšelio puslapis









pav. 3.7 Produkto puslapis



pav. 3.8 Produkto pranešimo modalas

Sort By: Name (A-Z)

 <p><b>LIDL</b></p> <p>Stores: 0 Products: 188 Active Discounts: 22</p> <p>Products: 181 Active Discounts: 0</p>	 <p><b>MAXIMA</b></p> <p>Stores: 1 Products: 534 Active Discounts: 196</p> <p>Products: 193 Active Discounts: 0</p>
 <p><b>RIMI</b></p> <p>Stores: 2 Products: 118 Active Discounts: 25</p> <p>Products: 666 Active Discounts: 0</p>	 <p><b>RIMI</b></p> <p>Stores: 1 Products: 526 Active Discounts: 196</p> <p>Products: 815 Active Discounts: 0</p>

pav. 3.9 Parduotuvių puslapis

### Submit a Store Discount

Choose a store (chain + address), scope, and discount details.

**Store Chain**

**Store Address**

**Discount name**

**Description (optional)**

**Scope**  
☐ All products in store  
☐ Specific category  
☐ Specific product

**Discount type**

**Value**

**Starts at**

**Ends at**

pav. 3.10 Nuolaidos sukūrimo puslapis

### My Profile

Name:

test

Email:

test@test.com

#### Change Password

Current Password

New Password

Confirm New Password

Change Password

#### Wishlisted Items

Bulvių  
traškučiai  
griet.svog.,  
PRINGLES,  
165g

2.99 €

Akytasis  
šokoladas  
ROSHEN  
BUBBLE\*, 3  
rūšių, 80 g

1.69 €

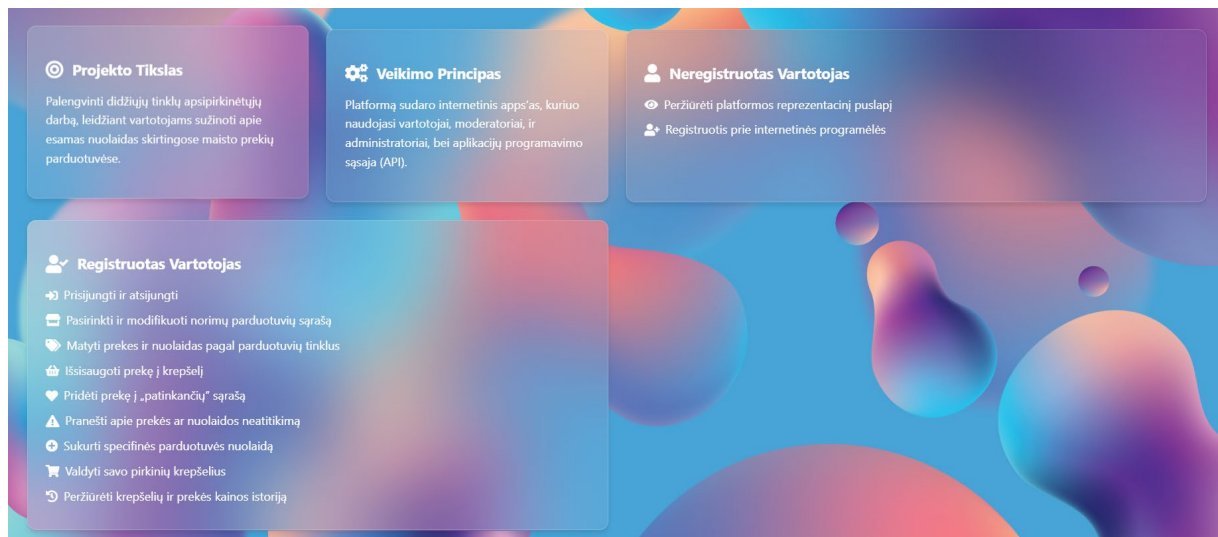
pav. 3.11 Vartotojo profilio puslapis

11

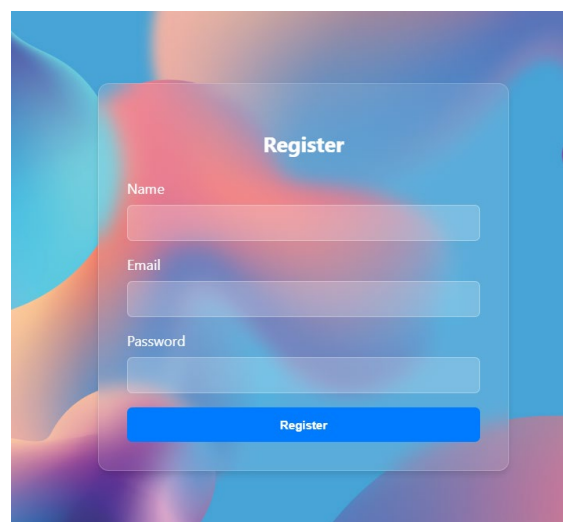
## 3.2. Įgyvendintas dizainas



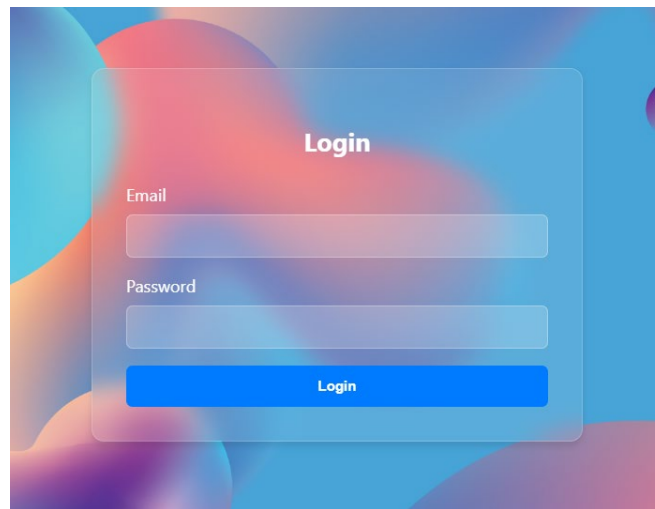
pav. 3.12 Puslapio antraštė (angl. header)



pav. 3.13 Pagrindinis puslapis



pav. 3.14 Registracijos puslapis



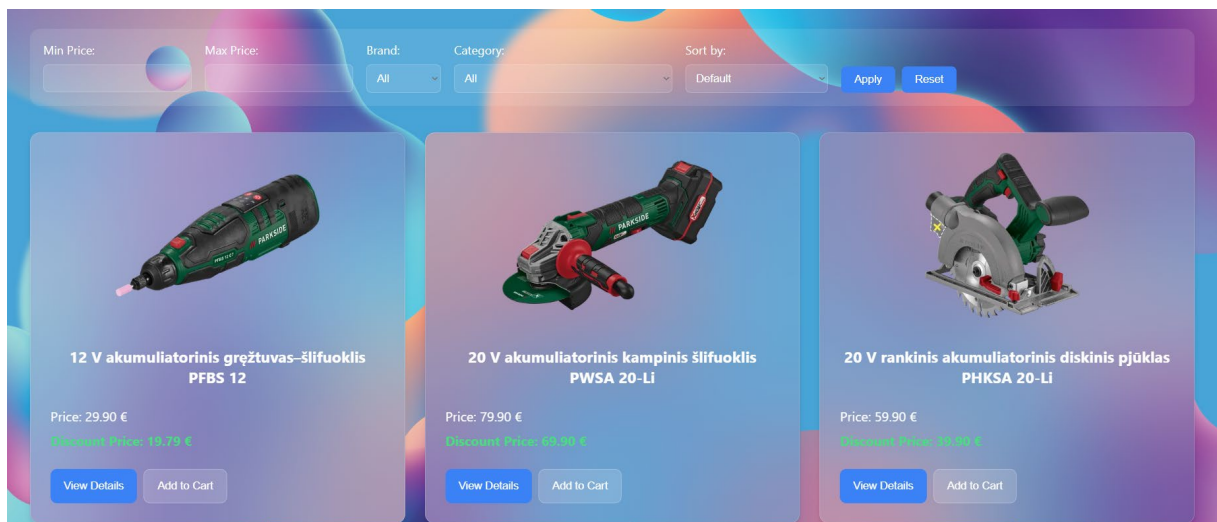
**Login**

Email


Password

**Login**

*pav. 3.15 Prisijungimo puslapis*




Min Price:  Max Price:  Brand:  Category:  Sort by:  [Apply](#) [Reset](#)



**12 V akumulatorinis gręžtuvas-šlifukoqlis  
PFBS 12**

Price: 29.90 €  
~~Discount Price: 19.79 €~~


[View Details](#) [Add to Cart](#)



**20 V akumulatorinis kampinis šlifukoqlis  
PWSA 20-Li**

Price: 79.90 €  
~~Discount Price: 69.99 €~~

[View Details](#) [Add to Cart](#)

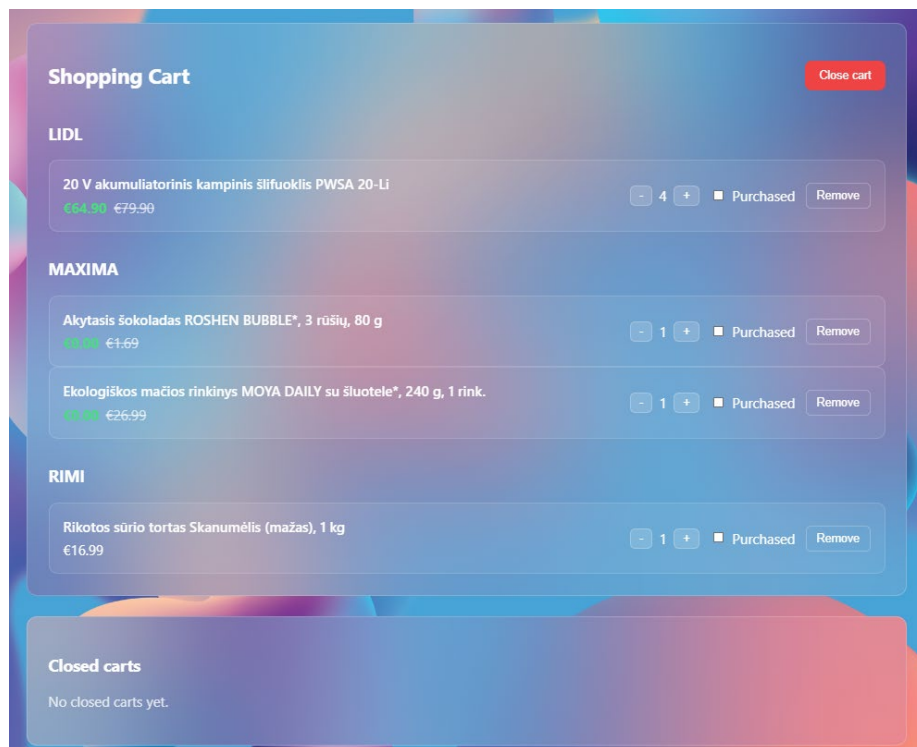


**20 V rankinis akumulatorinis diskinis pjūklas  
PHKSA 20-Li**

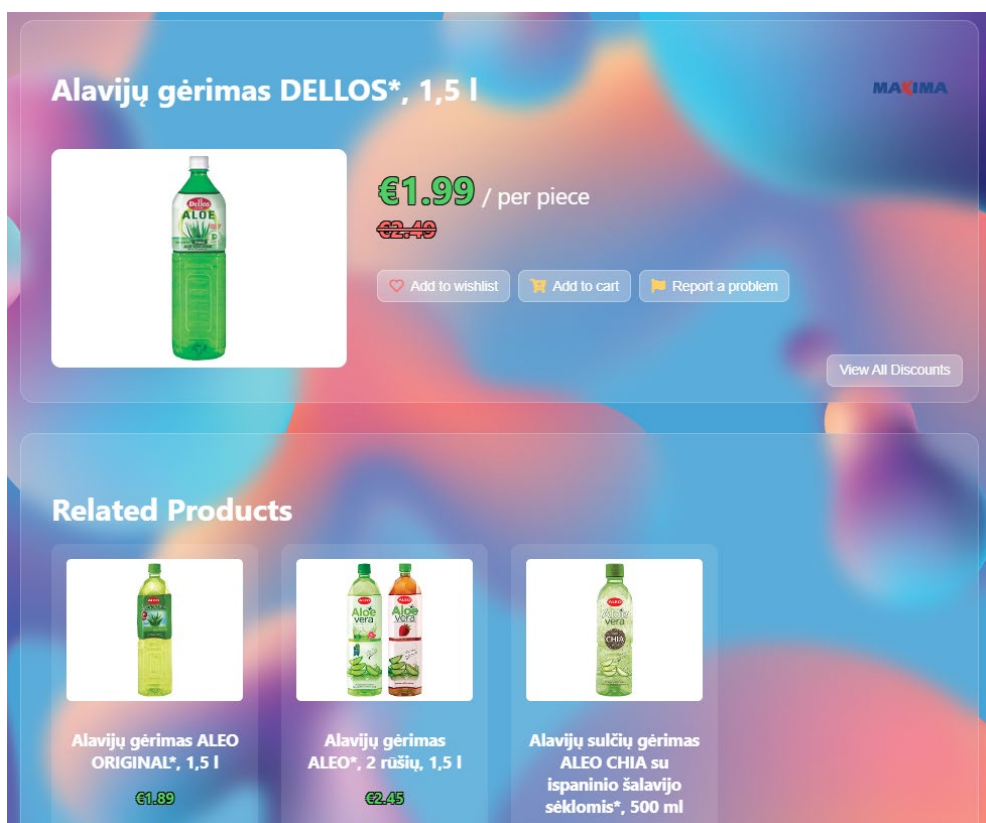
Price: 59.90 €  
~~Discount Price: 49.99 €~~

[View Details](#) [Add to Cart](#)

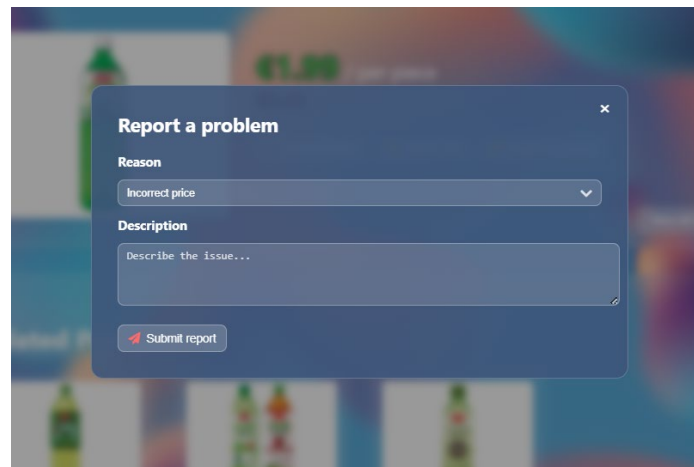
*pav. 3.16 Produktų puslapis*



pav. 3.17 Krepšelio puslapis



pav. 3.18 Produkto puslapis



**Report a problem** ✕

**Reason**

Incorrect price ▼

**Description**

Describe the issue...

🚩 Submit report

pav. 3.19 Produkto pranešimo modalas



Sort by: Name (A-Z)

Retailer	Stores	Products	Active Discounts
<b>LIDL</b>	0	118	22
<b>MAXIMA</b>	1	534	196
<b>RIMI</b>	2	626	0

pav. 3.20 Parduotuvių puslapis



### Submit a Store Discount

Choose a store (chain + address), scope, and discount details.

**Store Chain**

**Store Address**

**Discount name**

**Description (optional)**

**Scope**  
☒ All products in store  
☐ Specific category  
☐ Specific product

**Discount type**

**Value**

**Starts at**

**Ends at**

Submit Discount

pav. 3.21 Nuolaidos sukūrimo puslapis

### My Profile

**Name:**

**Email:**

### Change Password


**Current Password**

**New Password**

**Confirm New Password**


Change Password

### Wishlisted Items



Bulvių traškučiai griet.svog., PRINGLES, 165g

2.99 €



Alytasis šokoladas ROSEN BUBBLE\*, 3 rūšių, 80 g

1.69 €

pav. 3.22 Vartotojo profilio puslapis



## 4. API specifikacija

Norint peržiūrėti API specifikaciją, galima pasinaudoti šia nuoroda:

- [saitynai.raksnys.lt/api/schema/redoc](https://saitynai.raksnys.lt/api/schema/redoc)

api-specification.yaml

openapi: 3.0.3

info:

title: Nuolaidauk API

version: 1.0.0

description: API for the Nuolaidauk project

paths:

/api/catalog/brands/:

get:

operationId: api\_catalog\_brands\_list

summary: List brands

tags:

- Brands

security:

- jwtCookieAuth: []

- jwtCookieAuth: []

- {}

responses:

'200':

content:

application/json:

schema:

type: array

items:

\$ref: '#/components/schemas/Brand'

description: ''

post:

operationId: api\_catalog\_brands\_create

summary: Create brand

```

tags:
- Brands
requestBody:
  content:
    application/json:
      schema:
        $ref: '#/components/schemas/Brand'
    application/x-www-form-urlencoded:
      schema:
        $ref: '#/components/schemas/Brand'
    multipart/form-data:
      schema:
        $ref: '#/components/schemas/Brand'
  required: true
security:
- jwtCookieAuth: []
- jwtCookieAuth: []
responses:
  '201':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Brand'
    description: ''
/api/catalog/brands/{id}/:
  get:
    operationId: api_catalog_brands_retrieve
    summary: Get brand
    parameters:
      - in: path
        name: id
        schema:
          type: integer

```

```

        description: A unique integer value identifying this brand.
        required: true
    tags:
    - Brands
    security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
    - {}
    responses:
      '200':
        content:
          application/json:
            schema:
              $ref: '#/components/schemas/Brand'
            description: ''
    put:
      operationId: api_catalog_brands_update
      summary: Update brand
      parameters:
      - in: path
        name: id
        schema:
          type: integer
        description: A unique integer value identifying this brand.
        required: true
      tags:
      - Brands
      requestBody:
        content:
          application/json:
            schema:
              $ref: '#/components/schemas/Brand'
          application/x-www-form-urlencoded:

```

```

      schema:
        $ref: '#/components/schemas/Brand'
    multipart/form-data:
      schema:
        $ref: '#/components/schemas/Brand'
    required: true
  security:
  - jwtCookieAuth: []
  - jwtCookieAuth: []
  responses:
    '200':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/Brand'
      description: ''
  patch:
    operationId: api_catalog_brands_partial_update
    summary: Partially update brand
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        description: A unique integer value identifying this brand.
        required: true
    tags:
      - Brands
  requestBody:
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/PatchedBrand'

```

```

    application/x-www-form-urlencoded:
      schema:
        $ref: '#/components/schemas/PatchedBrand'
    multipart/form-data:
      schema:
        $ref: '#/components/schemas/PatchedBrand'
  security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
  responses:
    '200':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/Brand'
      description: ''
delete:
  operationId: api_catalog_brands_destroy
  summary: Delete brand
  parameters:
    - in: path
      name: id
      schema:
        type: integer
      description: A unique integer value identifying this brand.
      required: true
  tags:
    - Brands
  security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
  responses:
    '204':

```

```

        description: No response body
    /api/catalog/categories/:
        get:
            operationId: api_catalog_categories_list
            summary: List categories
            tags:
                - Categories
            security:
                - jwtCookieAuth: []
                - jwtCookieAuth: []
                - {}
            responses:
                '200':
                    content:
                        application/json:
                            schema:
                                type: array
                                items:
                                    $ref: '#/components/schemas/Category'
                    description: ''
        post:
            operationId: api_catalog_categories_create
            summary: Create category
            tags:
                - Categories
            requestBody:
                content:
                    application/json:
                        schema:
                            $ref: '#/components/schemas/Category'
                    application/x-www-form-urlencoded:
                        schema:
                            $ref: '#/components/schemas/Category'

```

```

      multipart/form-data:
        schema:
          $ref: '#/components/schemas/Category'
        required: true
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
    responses:
      '201':
        content:
          application/json:
            schema:
              $ref: '#/components/schemas/Category'
            description: ''
/api/catalog/categories/{id}/:
  get:
    operationId: api_catalog_categories_retrieve
    summary: Get category
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        description: A unique integer value identifying this category.
        required: true
    tags:
      - Categories
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
      - {}
    responses:
      '200':

```

```

    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Category'
        description: ''
  put:
    operationId: api_catalog_categories_update
    summary: Update category
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        description: A unique integer value identifying this category.
        required: true
    tags:
      - Categories
    requestBody:
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/Category'
        application/x-www-form-urlencoded:
          schema:
            $ref: '#/components/schemas/Category'
        multipart/form-data:
          schema:
            $ref: '#/components/schemas/Category'
      required: true
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
    responses:

```



```

    '200':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/Category'
        description: ''
      patch:
        operationId: api_catalog_categories_partial_update
        summary: Partially update category
        parameters:
          - in: path
            name: id
            schema:
              type: integer
            description: A unique integer value identifying this category.
            required: true
        tags:
          - Categories
        requestBody:
          content:
            application/json:
              schema:
                $ref: '#/components/schemas/PatchedCategory'
            application/x-www-form-urlencoded:
              schema:
                $ref: '#/components/schemas/PatchedCategory'
            multipart/form-data:
              schema:
                $ref: '#/components/schemas/PatchedCategory'
        security:
          - jwtCookieAuth: []
          - jwtCookieAuth: []
      responses:

```

```

    '200':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/Category'
          description: ''
      delete:
        operationId: api_catalog_categories_destroy
        summary: Delete category
        parameters:
          - in: path
            name: id
            schema:
              type: integer
            description: A unique integer value identifying this category.
            required: true
        tags:
          - Categories
        security:
          - jwtCookieAuth: []
          - jwtCookieAuth: []
        responses:
          '204':
            description: No response body
/api/catalog/discounts/:
  get:
    operationId: api_catalog_discounts_list
    summary: List discounts
    tags:
      - Discounts
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []

```

```

- {}
responses:
  '200':
    content:
      application/json:
        schema:
          type: array
          items:
            $ref: '#/components/schemas/Discount'
    description: ''
post:
  operationId: api_catalog_discounts_create
  summary: Create discount
  tags:
    - Discounts
  requestBody:
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Discount'
      application/x-www-form-urlencoded:
        schema:
          $ref: '#/components/schemas/Discount'
      multipart/form-data:
        schema:
          $ref: '#/components/schemas/Discount'
    required: true
  security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
    - {}
  responses:
    '201':

```

```

        content:
          application/json:
            schema:
              $ref: '#/components/schemas/Discount'
            description: ''
/api/catalog/discounts/{id}/:
  get:
    operationId: api_catalog_discounts_retrieve
    summary: Get discount
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        description: A unique integer value identifying this discount.
        required: true
    tags:
      - Discounts
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
      - {}
    responses:
      '200':
        content:
          application/json:
            schema:
              $ref: '#/components/schemas/Discount'
            description: ''
  put:
    operationId: api_catalog_discounts_update
    summary: Update discount
    parameters:

```

```

- in: path
  name: id
  schema:
    type: integer
  description: A unique integer value identifying this discount.
  required: true
tags:
- Discounts
requestBody:
  content:
    application/json:
      schema:
        $ref: '#/components/schemas/Discount'
    application/x-www-form-urlencoded:
      schema:
        $ref: '#/components/schemas/Discount'
    multipart/form-data:
      schema:
        $ref: '#/components/schemas/Discount'
  required: true
security:
- jwtCookieAuth: []
- jwtCookieAuth: []
- {}
responses:
  '200':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Discount'
        description: ''
patch:
  operationId: api_catalog_discounts_partial_update

```

```

summary: Partially update discount

parameters:
- in: path
  name: id
  schema:
    type: integer
  description: A unique integer value identifying this discount.
  required: true
tags:
- Discounts
requestBody:
  content:
    application/json:
      schema:
        $ref: '#/components/schemas/PatchedDiscount'
    application/x-www-form-urlencoded:
      schema:
        $ref: '#/components/schemas/PatchedDiscount'
    multipart/form-data:
      schema:
        $ref: '#/components/schemas/PatchedDiscount'
security:
- jwtCookieAuth: []
- jwtCookieAuth: []
- {}
responses:
  '200':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Discount'
        description: ''
delete:

```

```

operationId: api_catalog_discounts_destroy
summary: Delete discount
parameters:
- in: path
  name: id
  schema:
    type: integer
  description: A unique integer value identifying this discount.
  required: true
tags:
- Discounts
security:
- jwtCookieAuth: []
- jwtCookieAuth: []
- {}
responses:
  '204':
    description: No response body
/api/catalog/discounts/moderation/:
get:
  operationId: api_catalog_discounts_moderation_list
  summary: List submitted discounts (moderation)
  tags:
  - Discounts Moderation
  security:
  - jwtCookieAuth: []
  - jwtCookieAuth: []
  responses:
    '200':
      content:
        application/json:
          schema:
            type: array

```

```

        items:
            $ref: '#/components/schemas/DiscountModeration'
        description: ''
/api/catalog/discounts/moderation/{id}/:
  get:
    operationId: api_catalog_discounts_moderation_retrieve
    summary: Retrieve a discount (moderation)
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        required: true
    tags:
      - Discounts Moderation
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
    responses:
      '200':
        content:
          application/json:
            schema:
              $ref: '#/components/schemas/DiscountModeration'
            description: ''
  put:
    operationId: api_catalog_discounts_moderation_update
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        required: true

```



```

tags:
- api
requestBody:
  content:
    application/json:
      schema:
        $ref: '#/components/schemas/DiscountModeration'
    application/x-www-form-urlencoded:
      schema:
        $ref: '#/components/schemas/DiscountModeration'
    multipart/form-data:
      schema:
        $ref: '#/components/schemas/DiscountModeration'
  security:
- jwtCookieAuth: []
- jwtCookieAuth: []
responses:
  '200':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/DiscountModeration'
    description: ''
patch:
  operationId: api_catalog_discounts_moderation_partial_update
  summary: Update discount status (moderation)
  parameters:
- in: path
  name: id
  schema:
    type: integer
  required: true
  tags:

```

```

- Discounts Moderation

requestBody:
  content:
    application/json:
      schema:
        $ref: '#/components/schemas/PatchedDiscountModeration'
    application/x-www-form-urlencoded:
      schema:
        $ref: '#/components/schemas/PatchedDiscountModeration'
    multipart/form-data:
      schema:
        $ref: '#/components/schemas/PatchedDiscountModeration'
  security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
responses:
  '200':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/DiscountModeration'
        description: ''
/api/catalog/product-discount-history/:
  get:
    operationId: api_catalog_product_discount_history_list
    summary: List product discount history
    tags:
      - Product Discount History
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
      - {}
    responses:

```

```

    '200':
      content:
        application/json:
          schema:
            type: array
            items:
              $ref: '#/components/schemas/ProductDiscountHistory'
          description: ''
  /api/catalog/product-discount-history/{id}/:
    get:
      operationId: api_catalog_product_discount_history_retrieve
      summary: Get product discount history
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          description: A unique integer value identifying this product discount
history.
      required: true
      tags:
        - Product Discount History
      security:
        - jwtCookieAuth: []
        - jwtCookieAuth: []
        - {}
      responses:
        '200':
          content:
            application/json:
              schema:
                $ref: '#/components/schemas/ProductDiscountHistory'
              description: ''
  /api/catalog/products/:

```

```
get:
  operationId: api_catalog_products_list
  summary: List products
  parameters:
    - in: query
      name: brand
      schema:
        type: string
    - in: query
      name: category
      schema:
        type: string
    - in: query
      name: max_price
      schema:
        type: number
    - in: query
      name: min_price
      schema:
        type: number
    - name: ordering
      required: false
      in: query
      description: Which field to use when ordering the results.
      schema:
        type: string
    - name: page
      required: false
      in: query
      description: A page number within the paginated result set.
      schema:
        type: integer
    - name: page_size
```

```

    required: false
    in: query
    description: Number of results to return per page.
    schema:
      type: integer
  tags:
  - Products
  security:
  - jwtCookieAuth: []
  - jwtCookieAuth: []
  - {}
  responses:
    '200':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/PaginatedProductList'
      description: ''
  post:
    operationId: api_catalog_products_create
    summary: Create product
    tags:
    - Products
    requestBody:
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/Product'
        application/x-www-form-urlencoded:
          schema:
            $ref: '#/components/schemas/Product'
      multipart/form-data:
        schema:

```

```

        $ref: '#/components/schemas/Product'

        required: true
    security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
    responses:
        '201':
            content:
                application/json:
                    schema:
                        $ref: '#/components/schemas/Product'
                    description: ''
/api/catalog/products/{id}/:
    get:
        operationId: api_catalog_products_retrieve
        summary: Get product
        parameters:
        - in: path
          name: id
          schema:
              type: integer
          description: A unique integer value identifying this product.
          required: true
        tags:
        - Products
    security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
    - {}
    responses:
        '200':
            content:
                application/json:

```

```

      schema:
        $ref: '#/components/schemas/Product'
      description: ''
    put:
      operationId: api_catalog_products_update
      summary: Update product
      parameters:
        - in: path
          name: id
          schema:
            type: integer
          description: A unique integer value identifying this product.
          required: true
      tags:
        - Products
      requestBody:
        content:
          application/json:
            schema:
              $ref: '#/components/schemas/Product'
          application/x-www-form-urlencoded:
            schema:
              $ref: '#/components/schemas/Product'
          multipart/form-data:
            schema:
              $ref: '#/components/schemas/Product'
          required: true
      security:
        - jwtCookieAuth: []
        - jwtCookieAuth: []
      responses:
        '200':
          content:

```

```

    application/json:
      schema:
        $ref: '#/components/schemas/Product'
      description: ''
  patch:
    operationId: api_catalog_products_partial_update
    summary: Partially update product
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        description: A unique integer value identifying this product.
        required: true
    tags:
      - Products
    requestBody:
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/PatchedProduct'
        application/x-www-form-urlencoded:
          schema:
            $ref: '#/components/schemas/PatchedProduct'
        multipart/form-data:
          schema:
            $ref: '#/components/schemas/PatchedProduct'
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
    responses:
      '200':
        content:

```



```

        application/json:
          schema:
            $ref: '#/components/schemas/Product'
          description: ''
      delete:
        operationId: api_catalog_products_destroy
        summary: Delete product
        parameters:
          - in: path
            name: id
            schema:
              type: integer
            description: A unique integer value identifying this product.
            required: true
        tags:
          - Products
        security:
          - jwtCookieAuth: []
          - jwtCookieAuth: []
        responses:
          '204':
            description: No response body
/api/catalog/products/search/:
  get:
    operationId: api_catalog_products_search_retrieve
    tags:
      - api
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
      - {}
    responses:
      '200':

```

```

    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Product'
        description: ''
/api/catalog/reports/:
  post:
    operationId: api_catalog_reports_create
    summary: Report a product or a discount
    tags:
      - Reports
    requestBody:
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/ReportCreate'
        application/x-www-form-urlencoded:
          schema:
            $ref: '#/components/schemas/ReportCreate'
        multipart/form-data:
          schema:
            $ref: '#/components/schemas/ReportCreate'
      required: true
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
    responses:
      '201':
        content:
          application/json:
            schema:
              $ref: '#/components/schemas/ReportCreate'
          description: ''

```

```

/api/catalog/reports/moderation/:
  get:
    operationId: api_catalog_reports_moderation_list
    summary: List reported items (moderation)
    tags:
      - Reports
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
    responses:
      '200':
        content:
          application/json:
            schema:
              type: array
              items:
                $ref: '#/components/schemas/ReportModeration'
        description: ''
/api/catalog/reports/moderation/{id}/:
  get:
    operationId: api_catalog_reports_moderation_retrieve
    summary: Retrieve a report (moderation)
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        required: true
    tags:
      - Reports
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []

```

```

responses:
  '200':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/ReportModeration'
        description: ''
put:
  operationId: api_catalog_reports_moderation_update
  parameters:
    - in: path
      name: id
      schema:
        type: integer
      required: true
  tags:
    - api
  requestBody:
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/ReportModeration'
      application/x-www-form-urlencoded:
        schema:
          $ref: '#/components/schemas/ReportModeration'
      multipart/form-data:
        schema:
          $ref: '#/components/schemas/ReportModeration'
  security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
  responses:
    '200':

```

```

    content:
      application/json:
        schema:
          $ref: '#/components/schemas/ReportModeration'
        description: ''
  patch:
    operationId: api_catalog_reports_moderation_partial_update
    summary: Update report status (moderation)
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        required: true
    tags:
      - Reports
    requestBody:
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/PatchedReportModeration'
        application/x-www-form-urlencoded:
          schema:
            $ref: '#/components/schemas/PatchedReportModeration'
        multipart/form-data:
          schema:
            $ref: '#/components/schemas/PatchedReportModeration'
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
    responses:
      '200':
        content:

```

```

        application/json:
            schema:
                $ref: '#/components/schemas/ReportModeration'
            description: ''
/api/catalog/shopping-carts/:
    get:
        operationId: api_catalog_shopping_carts_list
        summary: List your shopping carts
        tags:
            - Shopping Carts
        security:
            - jwtCookieAuth: []
            - jwtCookieAuth: []
        responses:
            '200':
                content:
                    application/json:
                        schema:
                            type: array
                            items:
                                $ref: '#/components/schemas/ShoppingCart'
                        description: ''
    post:
        operationId: api_catalog_shopping_carts_create
        summary: Create a shopping cart
        tags:
            - Shopping Carts
        requestBody:
            content:
                application/json:
                    schema:
                        $ref: '#/components/schemas/ShoppingCart'
                application/x-www-form-urlencoded:

```

```

        schema:
            $ref: '#/components/schemas/ShoppingCart'
    multipart/form-data:
        schema:
            $ref: '#/components/schemas/ShoppingCart'
    security:
        - jwtCookieAuth: []
        - jwtCookieAuth: []
    responses:
        '201':
            content:
                application/json:
                    schema:
                        $ref: '#/components/schemas/ShoppingCart'
            description: ''
/api/catalog/shopping-carts/{id}/:
    get:
        operationId: api_catalog_shopping_carts_retrieve
        summary: Get a shopping cart
        parameters:
            - in: path
              name: id
              schema:
                  type: string
              required: true
        tags:
            - Shopping Carts
        security:
            - jwtCookieAuth: []
            - jwtCookieAuth: []
        responses:
            '200':
                content:

```

```

        application/json:
            schema:
                $ref: '#/components/schemas/ShoppingCart'
            description: ''
    put:
        operationId: api_catalog_shopping_carts_update
        parameters:
            - in: path
              name: id
              schema:
                  type: string
              required: true
        tags:
            - api
        requestBody:
            content:
                application/json:
                    schema:
                        $ref: '#/components/schemas/ShoppingCart'
                application/x-www-form-urlencoded:
                    schema:
                        $ref: '#/components/schemas/ShoppingCart'
                multipart/form-data:
                    schema:
                        $ref: '#/components/schemas/ShoppingCart'
        security:
            - jwtCookieAuth: []
            - jwtCookieAuth: []
        responses:
            '200':
                content:
                    application/json:
                        schema:

```



```

    $ref: '#/components/schemas/ShoppingCart'
    description: ''
  patch:
    operationId: api_catalog_shopping_carts_partial_update
    parameters:
      - in: path
        name: id
        schema:
          type: string
        required: true
    tags:
      - api
    requestBody:
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/PatchedShoppingCart'
        application/x-www-form-urlencoded:
          schema:
            $ref: '#/components/schemas/PatchedShoppingCart'
        multipart/form-data:
          schema:
            $ref: '#/components/schemas/PatchedShoppingCart'
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
    responses:
      '200':
        content:
          application/json:
            schema:
              $ref: '#/components/schemas/ShoppingCart'
        description: ''

```

```

delete:
  operationId: api_catalog_shopping_carts_destroy
  parameters:
    - in: path
      name: id
      schema:
        type: string
      required: true
  tags:
    - api
  security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
  responses:
    '204':
      description: No response body
/api/catalog/shopping-carts/{id}/add-item/:
  post:
    operationId: api_catalog_shopping_carts_add_item_create
    summary: Add or increase an item
    parameters:
      - in: path
        name: id
        schema:
          type: string
        required: true
    tags:
      - Shopping Carts
    requestBody:
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/ShoppingCartItem'

```

```

    application/x-www-form-urlencoded:
      schema:
        $ref: '#/components/schemas/ShoppingCartItem'
    multipart/form-data:
      schema:
        $ref: '#/components/schemas/ShoppingCartItem'
    required: true
  security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
  responses:
    '200':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/ShoppingCart'
      description: ''
/api/catalog/shopping-carts/{id}/close/:
  post:
    operationId: api_catalog_shopping_carts_close_create
    summary: Close the cart
    parameters:
      - in: path
        name: id
        schema:
          type: string
        required: true
    tags:
      - Shopping Carts
    requestBody:
      content:
        application/json:
          schema:

```

```

        $ref: '#/components/schemas/ShoppingCart'
    application/x-www-form-urlencoded:
        schema:
            $ref: '#/components/schemas/ShoppingCart'
    multipart/form-data:
        schema:
            $ref: '#/components/schemas/ShoppingCart'
security:
- jwtCookieAuth: []
- jwtCookieAuth: []
responses:
  '200':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/ShoppingCart'
    description: ''
/api/catalog/shopping-carts/{id}/remove-item/:
  delete:
    operationId: api_catalog_shopping_carts_remove_item_destroy
    summary: Remove an item
    parameters:
      - in: path
        name: id
        schema:
          type: string
        required: true
    tags:
      - Shopping Carts
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
    responses:

```

```

    '200':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/ShoppingCart'
          description: ''
      /api/catalog/shopping-carts/{id}/update-item/:
        patch:
          operationId: api_catalog_shopping_carts_update_item_partial_update
          summary: Update item quantity/purchased
          parameters:
            - in: path
              name: id
              schema:
                type: string
              required: true
          tags:
            - Shopping Carts
          requestBody:
            content:
              application/json:
                schema:
                  $ref: '#/components/schemas/PatchedShoppingCartItem'
              application/x-www-form-urlencoded:
                schema:
                  $ref: '#/components/schemas/PatchedShoppingCartItem'
              multipart/form-data:
                schema:
                  $ref: '#/components/schemas/PatchedShoppingCartItem'
          security:
            - jwtCookieAuth: []
            - jwtCookieAuth: []
          responses:

```

```

    '200':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/ShoppingCart'
          description: ''
/api/catalog/stores/:
  get:
    operationId: api_catalog_stores_list
    summary: List stores
    tags:
      - Stores
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
      - {}
    responses:
      '200':
        content:
          application/json:
            schema:
              type: array
              items:
                $ref: '#/components/schemas/Store'
            description: ''
  post:
    operationId: api_catalog_stores_create
    summary: Create store
    tags:
      - Stores
    requestBody:
      content:
        application/json:

```

```

        schema:
          $ref: '#/components/schemas/Store'
      application/x-www-form-urlencoded:
        schema:
          $ref: '#/components/schemas/Store'
      multipart/form-data:
        schema:
          $ref: '#/components/schemas/Store'
    required: true
  security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
  responses:
    '201':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/Store'
      description: ''

```

/api/catalog/stores/{id}/:

```

get:
  operationId: api_catalog_stores_retrieve
  summary: Get store
  parameters:
    - in: path
      name: id
      schema:
        type: integer
      description: A unique integer value identifying this store.
      required: true
  tags:
    - Stores
  security:

```

```

- jwtCookieAuth: []
- jwtCookieAuth: []
- {}
responses:
  '200':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Store'
        description: ''
put:
  operationId: api_catalog_stores_update
  summary: Update store
  parameters:
    - in: path
      name: id
      schema:
        type: integer
      description: A unique integer value identifying this store.
      required: true
  tags:
    - Stores
  requestBody:
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Store'
      application/x-www-form-urlencoded:
        schema:
          $ref: '#/components/schemas/Store'
      multipart/form-data:
        schema:
          $ref: '#/components/schemas/Store'

```



```

    required: true
  security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
  responses:
    '200':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/Store'
          description: ''
  patch:
    operationId: api_catalog_stores_partial_update
    summary: Partially update store
    parameters:
      - in: path
        name: id
        schema:
          type: integer
        description: A unique integer value identifying this store.
        required: true
    tags:
      - Stores
    requestBody:
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/PatchedStore'
        application/x-www-form-urlencoded:
          schema:
            $ref: '#/components/schemas/PatchedStore'
        multipart/form-data:
          schema:

```

```

        $ref: '#/components/schemas/PatchedStore'

security:
  - jwtCookieAuth: []
  - jwtCookieAuth: []
responses:
  '200':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Store'
        description: ''
delete:
  operationId: api_catalog_stores_destroy
  summary: Delete store
  parameters:
    - in: path
      name: id
      schema:
        type: integer
      description: A unique integer value identifying this store.
      required: true
  tags:
    - Stores
  security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
  responses:
    '204':
      description: No response body
/api/catalog/user/discounts/:
  get:
    operationId: api_catalog_user_discounts_list
    description: Returns discounts submitted by the current user in reverse
    chronological

```

```

    order.

summary: List submitted discounts
tags:
  - User Discounts
security:
  - jwtCookieAuth: []
  - jwtCookieAuth: []
responses:
  '200':
    content:
      application/json:
        schema:
          type: array
          items:
            $ref: '#/components/schemas/UserDiscountList'
        description: ''
post:
  operationId: api_catalog_user_discounts_create
  description: Submit a discount targeting a product or category. Exactly one
    of product_id, category_id, or new_product must be provided. When
    providing
      new_product, its brand must match the store's brand.
  summary: Submit a new discount
  tags:
    - User Discounts
  requestBody:
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/UserDiscountCreate'
      application/x-www-form-urlencoded:
        schema:
          $ref: '#/components/schemas/UserDiscountCreate'
      multipart/form-data:

```

```

      schema:
        $ref: '#/components/schemas/UserDiscountCreate'
      required: true
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
    responses:
      '201':
        content:
          application/json:
            schema:
              $ref: '#/components/schemas/UserDiscountList'
            description: ''
/api/catalog/user/wishlist/:
  get:
    operationId: api_catalog_user_wishlist_list
    summary: List wishlist items
    tags:
      - Wishlist
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
    responses:
      '200':
        content:
          application/json:
            schema:
              type: array
              items:
                $ref: '#/components/schemas/WishlistItem'
            description: ''
  post:
    operationId: api_catalog_user_wishlist_create

```

```

summary: Add product to wishlist
tags:
- Wishlist
requestBody:
  content:
    application/json:
      schema:
        $ref: '#/components/schemas/WishlistItem'
    application/x-www-form-urlencoded:
      schema:
        $ref: '#/components/schemas/WishlistItem'
    multipart/form-data:
      schema:
        $ref: '#/components/schemas/WishlistItem'
  required: true
security:
- jwtCookieAuth: []
- jwtCookieAuth: []
responses:
  '201':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/WishlistItem'
    description: ''
/api/catalog/user/wishlist/{product_id}/:
  delete:
    operationId: api_catalog_user_wishlist_destroy
    summary: Remove product from wishlist
    parameters:
      - in: path
        name: product_id
        schema:

```

```

        type: integer
        required: true
    tags:
    - Wishlist
    security:
    - jwtCookieAuth: []
    - jwtCookieAuth: []
    responses:
        '204':
            description: No response body
/api/change-password:
    post:
        operationId: api_change_password_create
        description: Changes the current user's password after verifying the current
            password.
        summary: Change password
        tags:
        - Users
        requestBody:
            content:
                application/json:
                    schema:
                        $ref: '#/components/schemas/ChangePassword'
                application/x-www-form-urlencoded:
                    schema:
                        $ref: '#/components/schemas/ChangePassword'
                multipart/form-data:
                    schema:
                        $ref: '#/components/schemas/ChangePassword'
            required: true
        security:
        - jwtCookieAuth: []
        - jwtCookieAuth: []

```

```

responses:
  '200':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Message'
        description: Password changed
  '400':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Error'
        description: Validation error
  '401':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Error'
        description: Unauthenticated

/api/list:
  get:
    operationId: api_list_retrieve
    description: Admin-only view to list all users.
    summary: List users
    tags:
      - Users
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
    responses:
      '200':
        content:
          application/json:

```

```

        schema:
          type: array
          items:
            $ref: '#/components/schemas/SimpleUser'
        description: List of users
    '401':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/Error'
          description: Unauthenticated/unauthorized
  /api/login:
    post:
      operationId: api_login_create
      description: Authenticate a user with email & password. JWT and refresh
token
      are also set as HttpOnly cookies.
      summary: Login
      tags:
      - Auth
      requestBody:
        content:
          application/json:
            schema:
              $ref: '#/components/schemas/Login'
          application/x-www-form-urlencoded:
            schema:
              $ref: '#/components/schemas/Login'
          multipart/form-data:
            schema:
              $ref: '#/components/schemas/Login'
        required: true
      security:
      - jwtCookieAuth: []

```



```

- {}
responses:
  '200':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Token'
        description: Tokens returned and set as cookies
  '401':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Error'
        description: Invalid credentials
/api/logout:
  post:
    operationId: api_logout_create
    description: Clears JWT and refresh cookies. No request body required.
    summary: Logout
    tags:
      - Auth
    security:
      - jwtCookieAuth: []
      - jwtCookieAuth: []
      - {}
    responses:
      '200':
        content:
          application/json:
            schema:
              $ref: '#/components/schemas/Message'
            description: Logged out
/api/refresh:

```

```

    post:
      operationId: api_refresh_create
      description: Exchanges a valid refresh cookie for a new access & refresh
token
      pair. No request body required.
      summary: Refresh access token
      tags:
      - Auth
      security:
      - jwtCookieAuth: []
      - {}
      responses:
        '200':
          content:
            application/json:
              schema:
                $ref: '#/components/schemas/Token'
              description: New tokens issued and set as cookies
        '401':
          content:
            application/json:
              schema:
                $ref: '#/components/schemas/Error'
              description: Missing/expired/invalid refresh token
  /api/register:
    post:
      operationId: api_register_create
      description: Create an account. Returns the created user without the
password.
      summary: Register a new user
      tags:
      - Auth
      requestBody:
        content:

```

```

    application/json:
      schema:
        $ref: '#/components/schemas/User'
    application/x-www-form-urlencoded:
      schema:
        $ref: '#/components/schemas/User'
    multipart/form-data:
      schema:
        $ref: '#/components/schemas/User'
    required: true
  security:
    - jwtCookieAuth: []
    - {}
  responses:
    '201':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/User'
      description: Created user
    '400':
      content:
        application/json:
          schema:
            $ref: '#/components/schemas/Error'
      description: Validation error
  /api/user:
    get:
      operationId: api_user_retrieve
      description: Returns the currently authenticated user's profile.
      summary: Get current user
      tags:
        - Users

```

```

security:
  - jwtCookieAuth: []
  - jwtCookieAuth: []
responses:
  '200':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/User'
        description: Authenticated user
  '401':
    content:
      application/json:
        schema:
          $ref: '#/components/schemas/Error'
        description: Unauthenticated
components:
  schemas:
    BlankEnum:
      enum:
        - ''
    Brand:
      type: object
      properties:
        id:
          type: integer
          readOnly: true
        name:
          type: string
          maxLength: 255
        stores_count:
          type: integer
          readOnly: true

```

```
products_count:
  type: integer
  readOnly: true
active_discounts_count:
  type: integer
  readOnly: true
created_at:
  type: string
  format: date-time
  readOnly: true
updated_at:
  type: string
  format: date-time
  readOnly: true
required:
- active_discounts_count
- created_at
- id
- name
- products_count
- stores_count
- updated_at
Category:
  type: object
  properties:
    id:
      type: integer
      readOnly: true
    created_at:
      type: string
      format: date-time
      readOnly: true
    updated_at:
```

```
    type: string
    format: date-time
    readOnly: true
  name:
    type: string
    maxLength: 255
  description:
    type: string
  required:
  - created_at
  - id
  - name
  - updated_at
ChangePassword:
  type: object
  properties:
    current_password:
      type: string
      writeOnly: true
    new_password:
      type: string
      writeOnly: true
  required:
  - current_password
  - new_password
Discount:
  type: object
  properties:
    id:
      type: integer
      readOnly: true
    effective_status:
      type: string
```

```

    readOnly: true
  created_at:
    type: string
    format: date-time
    readOnly: true
  updated_at:
    type: string
    format: date-time
    readOnly: true
  name:
    type: string
    maxLength: 255
  description:
    type: string
  discount_type:
    $ref: '#/components/schemas/DiscountTypeEnum'
  value:
    type: string
    format: decimal
    pattern: ^-?\d{0,8}(\?:\.\d{0,2})?$
  target_type:
    $ref: '#/components/schemas/TargetTypeEnum'
  starts_at:
    type: string
    format: date-time
  ends_at:
    type: string
    format: date-time
  status:
    $ref: '#/components/schemas/StatusEe5Enum'
  brand:
    type: integer
    nullable: true

```

```

    store:
      type: integer
      nullable: true
    category:
      type: integer
      nullable: true
    product:
      type: integer
      nullable: true
    submitted_by:
      type: integer
      nullable: true
  required:
    - created_at
    - discount_type
    - effective_status
    - ends_at
    - id
    - name
    - starts_at
    - target_type
    - updated_at
    - value
  DiscountModeration:
    type: object
    description: Serializer for moderators/admins to view and update discount
status.
    properties:
      id:
        type: integer
        readOnly: true
      name:
        type: string
        readOnly: true

```



```

description:
  type: string
  readOnly: true
discount_type:
  allOf:
    - $ref: '#/components/schemas/DiscountTypeEnum'
  readOnly: true
value:
  type: string
  format: decimal
  pattern: ^-?\d{0,8}(?:\.\d{0,2})?$
  readOnly: true
target_type:
  allOf:
    - $ref: '#/components/schemas/TargetTypeEnum'
  readOnly: true
brand:
  type: integer
  readOnly: true
  nullable: true
store:
  type: integer
  readOnly: true
  nullable: true
category:
  type: integer
  readOnly: true
  nullable: true
product:
  type: integer
  readOnly: true
  nullable: true
starts_at:

```

```

    type: string
    format: date-time
    readOnly: true
ends_at:
    type: string
    format: date-time
    readOnly: true
status:
    $ref: '#/components/schemas/StatusEe5Enum'
submitted_by:
    type: integer
    readOnly: true
    nullable: true
created_at:
    type: string
    format: date-time
    readOnly: true
required:
- brand
- category
- created_at
- description
- discount_type
- ends_at
- id
- name
- product
- starts_at
- store
- submitted_by
- target_type
- value
DiscountTypeEnum:

```

```

enum:
  - percentage
  - fixed
type: string
description: |-
  * `percentage` - Percentage
  * `fixed` - Fixed amount
Error:
  type: object
  properties:
    error:
      type: string
  required:
    - error
Login:
  type: object
  properties:
    email:
      type: string
      format: email
    password:
      type: string
      writeOnly: true
  required:
    - email
    - password
Message:
  type: object
  properties:
    message:
      type: string
  required:
    - message

```

```

NullEnum:
  enum:
    - null
PaginatedProductList:
  type: object
  required:
    - count
    - results
  properties:
    count:
      type: integer
      example: 123
    next:
      type: string
      nullable: true
      format: uri
      example: http://api.example.org/accounts/?page=4
    previous:
      type: string
      nullable: true
      format: uri
      example: http://api.example.org/accounts/?page=2
    results:
      type: array
      items:
        $ref: '#/components/schemas/Product'
PatchedBrand:
  type: object
  properties:
    id:
      type: integer
      readOnly: true
    name:

```

```
    type: string
    maxLength: 255
  stores_count:
    type: integer
    readOnly: true
  products_count:
    type: integer
    readOnly: true
  active_discounts_count:
    type: integer
    readOnly: true
  created_at:
    type: string
    format: date-time
    readOnly: true
  updated_at:
    type: string
    format: date-time
    readOnly: true
  PatchedCategory:
    type: object
  properties:
    id:
      type: integer
      readOnly: true
    created_at:
      type: string
      format: date-time
      readOnly: true
    updated_at:
      type: string
      format: date-time
      readOnly: true
```

```

    name:
      type: string
      maxLength: 255
    description:
      type: string
  PatchedDiscount:
    type: object
    properties:
      id:
        type: integer
        readOnly: true
      effective_status:
        type: string
        readOnly: true
      created_at:
        type: string
        format: date-time
        readOnly: true
      updated_at:
        type: string
        format: date-time
        readOnly: true
      name:
        type: string
        maxLength: 255
      description:
        type: string
      discount_type:
        $ref: '#/components/schemas/DiscountTypeEnum'
      value:
        type: string
        format: decimal
        pattern: ^-?\d{0,8}(\?:\.\d{0,2})?$$

```

```

    target_type:
      $ref: '#/components/schemas/TargetTypeEnum'
    starts_at:
      type: string
      format: date-time
    ends_at:
      type: string
      format: date-time
    status:
      $ref: '#/components/schemas/StatusEe5Enum'
    brand:
      type: integer
      nullable: true
    store:
      type: integer
      nullable: true
    category:
      type: integer
      nullable: true
    product:
      type: integer
      nullable: true
    submitted_by:
      type: integer
      nullable: true
  PatchedDiscountModeration:
    type: object
    description: Serializer for moderators/admins to view and update discount
status.
    properties:
      id:
        type: integer
        readOnly: true
      name:

```

```

    type: string
    readOnly: true
  description:
    type: string
    readOnly: true
  discount_type:
    allOf:
      - $ref: '#/components/schemas/DiscountTypeEnum'
    readOnly: true
  value:
    type: string
    format: decimal
    pattern: ^-?\d{0,8}(:\.\d{0,2})?$
    readOnly: true
  target_type:
    allOf:
      - $ref: '#/components/schemas/TargetTypeEnum'
    readOnly: true
  brand:
    type: integer
    readOnly: true
    nullable: true
  store:
    type: integer
    readOnly: true
    nullable: true
  category:
    type: integer
    readOnly: true
    nullable: true
  product:
    type: integer
    readOnly: true

```



```

    nullable: true
  starts_at:
    type: string
    format: date-time
    readOnly: true
  ends_at:
    type: string
    format: date-time
    readOnly: true
  status:
    $ref: '#/components/schemas/StatusEe5Enum'
  submitted_by:
    type: integer
    readOnly: true
    nullable: true
  created_at:
    type: string
    format: date-time
    readOnly: true
PatchedProduct:
  type: object
  properties:
    id:
      type: integer
      readOnly: true
    discounts:
      type: array
      items:
        $ref: '#/components/schemas/Discount'
      readOnly: true
    created_at:
      type: string
      format: date-time

```

```
    readOnly: true
  updated_at:
    type: string
    format: date-time
    readOnly: true
  external_id:
    type: string
    nullable: true
    maxLength: 255
  name:
    type: string
    maxLength: 255
  description:
    type: string
    nullable: true
  photo_url:
    type: string
    format: uri
    maxLength: 200
  price:
    type: string
    format: decimal
    pattern: ^-?\d{0,8}(\?:\.\d{0,2})?$
    nullable: true
  price_unit:
    nullable: true
    oneOf:
      - $ref: '#/components/schemas/PriceUnitEnum'
      - $ref: '#/components/schemas/BlankEnum'
      - $ref: '#/components/schemas/NullEnum'
  weight:
    type: string
    format: decimal
```

```

    pattern: ^-?\d{0,5}(\?:\.\d{0,3})?$
    nullable: true
  store:
    type: integer
    nullable: true
  brand_name:
    type: string
    readOnly: true
  brand:
    type: integer
    nullable: true
  category:
    type: integer
  PatchedReportModeration:
    type: object
    description: Serializer for moderators/admins to view and update report
status.
  properties:
    id:
      type: integer
      readOnly: true
    product:
      type: integer
      readOnly: true
      nullable: true
    discount:
      type: integer
      readOnly: true
      nullable: true
    product_reason:
      readOnly: true
      nullable: true
    oneOf:
      - $ref: '#/components/schemas/ProductReasonEnum'

```

```

    - $ref: '#/components/schemas/NullEnum'

discount_image_base64:
  type: string
  readOnly: true

description:
  type: string
  readOnly: true

status:
  $ref: '#/components/schemas/Status35eEnum'

created_at:
  type: string
  format: date-time
  readOnly: true
PatchedShoppingCart:
  type: object
  properties:
    id:
      type: integer
      readOnly: true
    name:
      type: string
      nullable: true
      maxLength: 255
    status:
      allOf:
        - $ref: '#/components/schemas/ShoppingCartStatusEnum'
      readOnly: true
    created_at:
      type: string
      format: date-time
      readOnly: true
    updated_at:
      type: string

```

```
    format: date-time
    readOnly: true
  items:
    type: array
    items:
      $ref: '#/components/schemas/ShoppingCartItem'
    readOnly: true
  PatchedShoppingCartItem:
    type: object
    properties:
      id:
        type: integer
        readOnly: true
      product:
        type: integer
      name:
        type: string
        readOnly: true
      price:
        type: string
        readOnly: true
      current_discount:
        type: string
        readOnly: true
      quantity:
        type: integer
        maximum: 9223372036854775807
        minimum: 0
        format: int64
      is_purchased:
        type: boolean
      brand:
        type: string
```

```
    readOnly: true
  brand_name:
    type: string
    readOnly: true
  PatchedStore:
    type: object
  properties:
    id:
      type: integer
      readOnly: true
    brand:
      type: integer
    created_at:
      type: string
      format: date-time
      readOnly: true
    updated_at:
      type: string
      format: date-time
      readOnly: true
    nickname:
      type: string
      description: Optional label to distinguish individual store locations.
      maxLength: 255
    address_line1:
      type: string
      maxLength: 255
    address_line2:
      type: string
      maxLength: 255
    city:
      type: string
      maxLength: 100
```

```

    state:
      type: string
      maxLength: 100
    postal_code:
      type: string
      maxLength: 20
    country:
      type: string
      maxLength: 100
  PriceUnitEnum:
    enum:
      - per_piece
      - per_kilogram
    type: string
    description: |-
      * `per_piece` - Per piece
      * `per_kilogram` - Per kilogram
  Product:
    type: object
    properties:
      id:
        type: integer
        readOnly: true
      discounts:
        type: array
        items:
          $ref: '#/components/schemas/Discount'
        readOnly: true
      created_at:
        type: string
        format: date-time
        readOnly: true
      updated_at:

```

```

    type: string
    format: date-time
    readOnly: true
external_id:
    type: string
    nullable: true
    maxLength: 255
name:
    type: string
    maxLength: 255
description:
    type: string
    nullable: true
photo_url:
    type: string
    format: uri
    maxLength: 200
price:
    type: string
    format: decimal
    pattern: ^-?\d{0,8}(\?:\.\d{0,2})?$
    nullable: true
price_unit:
    nullable: true
    oneOf:
      - $ref: '#/components/schemas/PriceUnitEnum'
      - $ref: '#/components/schemas/BlankEnum'
      - $ref: '#/components/schemas/NullEnum'
weight:
    type: string
    format: decimal
    pattern: ^-?\d{0,5}(\?:\.\d{0,3})?$
    nullable: true

```



```
    store:
      type: integer
      nullable: true
    brand_name:
      type: string
      readOnly: true
    brand:
      type: integer
      nullable: true
    category:
      type: integer
  required:
    - brand
    - brand_name
    - category
    - created_at
    - discounts
    - external_id
    - id
    - name
    - updated_at
  ProductDiscountHistory:
    type: object
    properties:
      id:
        type: integer
        readOnly: true
      applied_at:
        type: string
        format: date-time
        readOnly: true
      removed_at:
        type: string
```

```

    format: date-time
    nullable: true
    applied_price:
      type: string
      format: decimal
      pattern: ^-?\d{0,8}(\?:\.\d{0,2})?$
      description: Snapshot of the product price when the discount was
applied.
    product:
      type: integer
    discount:
      type: integer
    required:
      - applied_at
      - applied_price
      - discount
      - id
      - product
    ProductReasonEnum:
      enum:
        - name
        - photo
        - price
      type: string
      description: |-
        * `name` - Name
        * `photo` - Photo
        * `price` - Price
    ReportCreate:
      type: object
      description: |-
        Serializer for users to report a product or a discount.
        Rules enforced:
        - Exactly one of product or discount is provided

```

- If product is provided, product\_reason must be one of: name/photo/price
- If discount is provided, discount\_image\_base64 is required
- Description is required

properties:

- id:
  - type: integer
  - readOnly: true
- product:
  - type: integer
  - nullable: true
- discount:
  - type: integer
  - nullable: true
- product\_reason:
  - nullable: true
  - oneOf:
    - \$ref: '#/components/schemas/ProductReasonEnum'
    - \$ref: '#/components/schemas/BlankEnum'
    - \$ref: '#/components/schemas/NullEnum'
- discount\_image\_base64:
  - type: string
- description:
  - type: string
- status:
  - allOf:
    - \$ref: '#/components/schemas/Status35eEnum'
  - readOnly: true
- created\_at:
  - type: string
  - format: date-time
  - readOnly: true

required:

- created\_at

```

- description
- id
- status
ReportModeration:
  type: object
  description: Serializer for moderators/admins to view and update report
status.
  properties:
    id:
      type: integer
      readOnly: true
    product:
      type: integer
      readOnly: true
      nullable: true
    discount:
      type: integer
      readOnly: true
      nullable: true
    product_reason:
      readOnly: true
      nullable: true
      oneOf:
        - $ref: '#/components/schemas/ProductReasonEnum'
        - $ref: '#/components/schemas/NullEnum'
    discount_image_base64:
      type: string
      readOnly: true
    description:
      type: string
      readOnly: true
    status:
      $ref: '#/components/schemas/Status35eEnum'
    created_at:

```

```

    type: string
    format: date-time
    readOnly: true
required:
- created_at
- description
- discount
- discount_image_base64
- id
- product
- product_reason
RoleEnum:
  enum:
    - user
    - moderator
    - admin
  type: string
  description: |-
    * `user` - User
    * `moderator` - Moderator
    * `admin` - Admin
ShoppingCart:
  type: object
  properties:
    id:
      type: integer
      readOnly: true
    name:
      type: string
      nullable: true
      maxLength: 255
    status:
      allOf:

```

```

    - $ref: '#/components/schemas/ShoppingCartStatusEnum'
    readOnly: true
  created_at:
    type: string
    format: date-time
    readOnly: true
  updated_at:
    type: string
    format: date-time
    readOnly: true
  items:
    type: array
    items:
      $ref: '#/components/schemas/ShoppingCartItem'
    readOnly: true
  required:
    - created_at
    - id
    - items
    - status
    - updated_at
ShoppingCartItem:
  type: object
  properties:
    id:
      type: integer
      readOnly: true
    product:
      type: integer
    name:
      type: string
      readOnly: true
    price:

```

```

    type: string
    readOnly: true
  current_discount:
    type: string
    readOnly: true
  quantity:
    type: integer
    maximum: 9223372036854775807
    minimum: 0
    format: int64
  is_purchased:
    type: boolean
  brand:
    type: string
    readOnly: true
  brand_name:
    type: string
    readOnly: true
  required:
    - brand
    - brand_name
    - current_discount
    - id
    - name
    - price
    - product
  ShoppingCartStatusEnum:
    enum:
      - OPEN
      - CLOSED
    type: string
  description: |-
    * `OPEN` - Open

```

```

    * `CLOSED` - Closed

SimpleUser:
  type: object
  properties:
    id:
      type: integer
      readOnly: true
    name:
      type: string
      maxLength: 255
  required:
    - id
    - name
Status35eEnum:
  enum:
    - REPORTED
    - ACCEPTED
    - DENIED
  type: string
  description: |-
    * `REPORTED` - Reported
    * `ACCEPTED` - Accepted
    * `DENIED` - Denied
StatusEe5Enum:
  enum:
    - in_review
    - approved
    - denied
  type: string
  description: |-
    * `in_review` - In Review
    * `approved` - Approved
    * `denied` - Denied

```



```
Store:
  type: object
  properties:
    id:
      type: integer
      readOnly: true
    brand:
      type: integer
    created_at:
      type: string
      format: date-time
      readOnly: true
    updated_at:
      type: string
      format: date-time
      readOnly: true
    nickname:
      type: string
      description: Optional label to distinguish individual store locations.
      maxLength: 255
    address_line1:
      type: string
      maxLength: 255
    address_line2:
      type: string
      maxLength: 255
    city:
      type: string
      maxLength: 100
    state:
      type: string
      maxLength: 100
    postal_code:
```

```

    type: string
    maxLength: 20
  country:
    type: string
    maxLength: 100
  required:
    - address_line1
    - brand
    - city
    - created_at
    - id
    - postal_code
    - updated_at
  TargetTypeEnum:
    enum:
      - product
      - category
      - brand
      - store
    type: string
  description: |-
    * `product` - Product
    * `category` - Category
    * `brand` - Brand
    * `store` - Store
  Token:
    type: object
    properties:
      jwt:
        type: string
        readOnly: true
      refresh_token:
        type: string

```

```

        readOnly: true
    required:
    - jwt
    - refresh_token
User:
    type: object
    properties:
        id:
            type: integer
            readOnly: true
        name:
            type: string
            maxLength: 255
        email:
            type: string
            maxLength: 255
        password:
            type: string
            writeOnly: true
            maxLength: 255
        role:
            $ref: '#/components/schemas/RoleEnum'
    required:
    - email
    - id
    - name
    - password
UserDiscountCreate:
    type: object
    description: Serializer for users to submit a new discount for moderation.
    properties:
        id:
            type: integer

```

```
    readOnly: true
  name:
    type: string
    maxLength: 255
  description:
    type: string
  discount_type:
    $ref: '#/components/schemas/DiscountTypeEnum'
  value:
    type: string
    format: decimal
    pattern: ^-?\d{0,8}(\?:\.\d{0,2})?$
  starts_at:
    type: string
    format: date-time
  ends_at:
    type: string
    format: date-time
  store_id:
    type: integer
    writeOnly: true
  brand_id:
    type: integer
    writeOnly: true
  category_id:
    type: integer
    writeOnly: true
  product_id:
    type: integer
    writeOnly: true
  new_product:
    allOf:
      - $ref: '#/components/schemas/UserProductCreate'
```

```

        writeOnly: true
    all_products:
        type: boolean
        writeOnly: true
        default: false
    required:
    - discount_type
    - ends_at
    - id
    - name
    - starts_at
    - store_id
    - value
    UserDiscountList:
        type: object
        description: Serializer for listing user-submitted discounts with their
status.
        properties:
            id:
                type: integer
                readOnly: true
            name:
                type: string
                maxLength: 255
            description:
                type: string
            target_type:
                $ref: '#/components/schemas/TargetTypeEnum'
            starts_at:
                type: string
                format: date-time
            ends_at:
                type: string
                format: date-time

```

```

    effective_status:
      type: string
      readOnly: true
  required:
    - effective_status
    - ends_at
    - id
    - name
    - starts_at
    - target_type
  UserProductCreate:
    type: object
    description: Serializer for creating a product within the discount
    submission.
    properties:
      name:
        type: string
        maxLength: 255
      brand:
        type: string
      category:
        type: string
      price:
        type: string
        format: decimal
        pattern: ^-?\d{0,8}(\?:\.\d{0,2})?$
        nullable: true
      price_unit:
        nullable: true
        oneOf:
          - $ref: '#/components/schemas/PriceUnitEnum'
          - $ref: '#/components/schemas/BlankEnum'
          - $ref: '#/components/schemas/NullEnum'
      weight:

```

```

    type: string
    format: decimal
    pattern: ^-?\d{0,5}(\?:\.\d{0,3})?$
    nullable: true
  description:
    type: string
    nullable: true
  required:
  - brand
  - category
  - name
WishlistItem:
  type: object
  properties:
    id:
      type: integer
      readOnly: true
    product:
      type: integer
    product_name:
      type: string
      nullable: true
      readOnly: true
    product_photo_url:
      type: string
      nullable: true
      readOnly: true
    price:
      type: number
      format: double
      nullable: true
      readOnly: true
    discounted_price:

```

```

    type: number
    format: double
    nullable: true
    description: |-
        Return the best (lowest) discounted price if a discount is active;
        otherwise None.

        Active means: current time between starts_at and ends_at. We do not
        hard-require
        an APPROVED status here because upstream data may not consistently
        set it; the
        time window is the source of truth for activity.

        We first check direct discount rules on the product, then fall back
        to discount history.

    readOnly: true
    created_at:
        type: string
        format: date-time
        readOnly: true
    required:
      - created_at
      - discounted_price
      - id
      - price
      - product
      - product_name
      - product_photo_url
    securitySchemes:
      jwtCookieAuth:
        type: apiKey
        in: cookie
        name: jwt

```



## 5. Projekto išvados

- Projektas nesuteikė daug naujų žinių, leido praktiškai pritaikyti jau turimas žinias apie sistemų architektūrą, API kūrimą bei frontend ir backend technologijų naudojimą.
- Projektas leido plačiau susipažinti su OpenAPI dokumentacija, kuri leidžia lengvai suprasti ką atlieka kiekvienas sistemos API punktas.