Documentation

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Run

input :

- **contig : String (Example : "1")**

Chromosome number

- **start : String (Example : "527906")**

Chromosome start

- **end : String (Example : "842359")**

Chromosome end

- **db : String (Example : "1")**

wanted database

1) RAPdb (RAPID)

2) Gramene (RAPID)

3) Oryzabase (RAPID)

4) IC4R (RAPID)

5) Planttfdb (RAPID or MSU)

6) Plntfdb (MSU)

7) Funricegenes (RAPID or MSU)

8) Funricegenes bis (RAPID or MSU)

9) Funricegenes bis 2 (RAPID or MSU)

- **id : String RAPID or MSU (Example : "Os07g0586200")**

"None" if it's for call SnpSeek or ID to call a database

RAPdb (db = 1)

input :

- ➢ RAPID

output :

- ➢ JSON
    - ○ ID
    - ○ Description
    - ○ Position
    - ○ RAP-DB Gene Symbol Synonym(s)
    - ○ RAP-DB Gene Name Synonym(s)
    - ○ CGSNL Gene Symbol
    - ○ CGSNL Gene Name
    - ○ Oryzabase Gene Symbol Synonym(s)
    - ○ Oryzabase Gene Name Synonym(s)

Specifics errors :

- ➢ "Error : empty xxxx"

No result found for the field xxxx

Gramene (db = 2)

input :

- ➢ RAPID

output :

- ➢ JSON

Oryzabase (db = 3)

CGSNL Gene Symbol	Gene symbol synonym(s)	CGSNL Gene Name	Gene name synonym(s)	Chr. No.	Trait Class	Gene Ontology	Trait Ontology	Plant Ontology	RAP ID	Mutant Image
GELP92	OsGELP92 OsGELP92a OsGELP92b OsGELP92c AChE	GDSL ESTERASE/LIPASE PROTEIN 92	GDSL esterase/lipase protein 92 acetylcholinesterase	7	Biochemical character Tolerance and resistance - Stress tolerance	GO:0004560 - alpha-L-fucosidase activity GO:0006629 - lipid metabolic process GO:0009505 - plant-type cell wall GO:0009629 - response to gravity GO:0009630 - gravitropism GO:0016788 - hydrolase activity, acting on ester bonds	TO:0002693 - gravity response trait		Os07g0586200 Oryzabase (IRGSP 1.0 / Build5) Rap (IRGSP 1.0 / Build5)	

input :

➢ RAPID

output :

➢ Dataframe
- ○ Trait Gene Id
- ○ CGSNL Gene Symbol
- ○ Gene symbol synonym(s)
- ○ CGSNL Gene Name
- ○ Gene name synonym(s)
- ○ Protein Name
- ○ Allele
- ○ Chromosome No.
- ○ Explanation
- ○ Trait Class
- ○ RAP ID
- ○ Gramene ID
- ○ Arm
- ○ Locate(cM)
- ○ Gene Ontology
- ○ Trait Ontology
- ○ Plant Ontology

Specifics errors :

➢ Empty dataframe
The script has not found any correspondance with the given ID

Explanations :

This scripts has to send a request to Oryzabase but this time not by passing the ID in the URL. It is necessary to use post request (thanks to the function connectionErrorPost located in helper.py).

ic4r (db = 4)

Project ID	Experiment ID	Experiment name	Variety	Development stage	Tissue	Expression value
DRP000391	DRX000661	Callus_Normal	Nipponbare	N6D medium	Callus	5.55361
DRP000391	DRX000663	Leaf_Normal	Nipponbare	7 days before heading to 7 days after flowering	Leaf	0.518926
DRP000391	DRX000665	Panicle_Normal	Nipponbare	7 days before heading	Panicle	7.45369
DRP000391	DRX000667	Panicle_Normal	Nipponbare	7 days after flowering	Panicle	12.0421
DRP000391	DRX000669	Root_Normal	Nipponbare	7 days seedling	Root	0.993538
DRP000391	DRX000671	Seed_Normal	Nipponbare	mature seed	Seed	41.3672
DRP000391	DRX000673	Shoot_Normal	Nipponbare	7 days seedling	Shoot	6.5165
DRP000716	DRX002019	Root_-Pi_0day_r1	Nipponbare	14 days seedling	Root	0.648039
DRP000716	DRX002020	Root_-Pi_0day_r2	Nipponbare	14 days seedling	Root	1.05084
DRP000716	DRX002024	Root_-Pi_22day_r1	Nipponbare	14 days seedling	Root	1.31015

Showing 1 to 10 of 284 entries

Previous 1 2 3 4 5 … 29 Next

input :

➢ RAPID

output :

➢ JSON
- Variety
- Project ID
- Expression value
- Experiment name
- Tissue
- Experiment ID
- Development stage

Explanations :

The scripts takes headers (Project ID, Experiment ID, etc.) of the table and then it returns / displays (print for R) each row of the table.

Planttfdb (db = 5)

input :

➢ MSUID

Output :

➢ JSON
  ○ Family

Explanations :

The script goes to the download page of planttfdb. Then it's looking for the file "Oryza sativa subsp. japonica". This file is downloaded to the folder "resources" in the Python root directory. Then it uses this file and is looking for the MSU ID in parameter. If there is a correspondance, it returns the Family and if not, it returns False.

PIntfdb (db = 6)

input :

➢ MSUID

Output :

➢ JSON
  ○ Family

Explanations :

The scripts goes to PIntfdb website with MSUID in parameter of the URL. If the Family is known it returns the Family else it returns False.

Funricigenes (db = 7)

input :

➢ RAPID or MSUID

Output :

➢ JSON
   ○ Symbol

Explanations :

The scripts accesses directly with the link of the file and it searchs for RAPID or MSUID. It returns the Symbol.

Funricigenes (db = 8)

input :

➢ RAPID or MSUID

Output :

➢ JSON
  ○ Symbol
  ○ Name

Explanations :

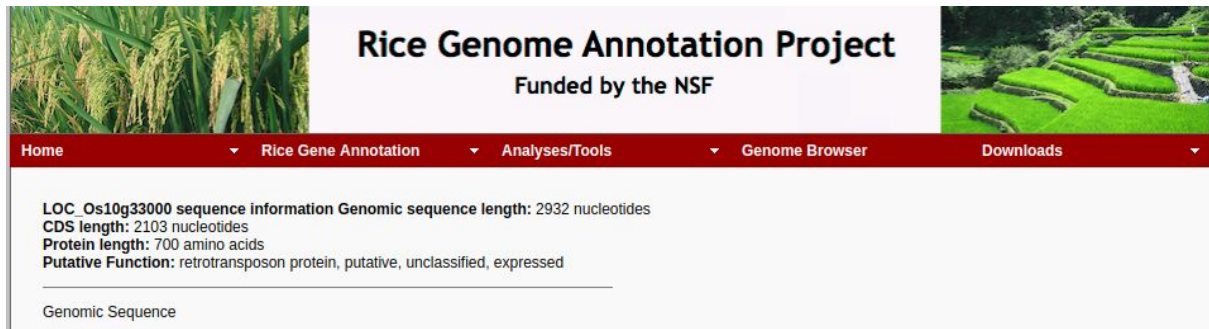Same as db 7

Funricigenes (db = 9)

input :

➢ RAPID or MSUID

Output :

➢ JSON
   ○ Symbol
   ○ Keywords
   ○ Title

Explanations :

Same as db 7

MSU (db = 10)

Input :

➢ MSUID

Output :

➢ JSON
  ○ Genomic Sequence
  ○ CDS
  ○ Protein

Explanations :

The scripts is looking for tag <pre> which is used only for DNA sequence.

Errors

➢ Website maintenance

This response code means that URI of requested resource has been changed temporarily. Generally because of website maintenance

➢ Bad request

This response means that server could not understand the request due to invalid syntax.

➢ Forbidden

The client does not have access rights to the content, i.e. they are unauthorized, so server is rejecting to give proper response. Unlike 401, the client's identity is known to the server.

➢ Not found

The server can not find requested resource. In the browser, this means the URL is not recognized. In an API, this can also mean that the endpoint is valid but the resource itself does not exist.

➢ Too Many Requests

The user has sent too many requests in a given amount of time ("rate limiting").

➢ Internal Server Error

The server has encountered a situation it doesn't know how to handle.

➢ Service Unavailable

The server is not ready to handle the request.

➢ Gateway Timeout

This error response is given when the server is acting as a gateway and cannot get a response in time.

➢ HTTP Version Not Supported

The HTTP version used in the request is not supported by the server.

➢ Unknow internet error

Other error that can't be identified. Generally because there is no internet connection or the website is down.