



Additional information on Reiseplanen Tariff requests to the HAFAS.api

Version 2.0
from 2023-11-22

Hacon Ingenieurgesellschaft mbH
Lister Straße 15
30163 Hannover
Germany

Content

1	tripInternal with getTariff=profilestring.....	3
2	stRoutes.....	4
2.1	With origin and destination	4
2.2	With origin only (on Zealand only)	5
3	spPrice	5
3.1	With origin and destination, optionally via.....	5
3.2	With reconstruction context	5
4	Others	6
5	PolygonForZone.....	6
6	Tariff Data Versions	6
7	Document History	7

Additional information on Rejseplanen Tariff requests to the HAFAS.api

Confidential Document / © by HACON – A Siemens Company / Version 26 / 2023-05-10 2 / 9

The information contained in this documentation is the property of HaCon. The document including its annexes and any attachments are considered as confidential.

By delivering these documents, HaCon presupposes that the customer accepts the agreement that the present documents must be treated confidentially and may not be made accessible to third parties without HaCon's written consent.

HAFAS API Server is a software solution of HaCon and will be continuously improved, thus content of the document and written realization of features may change without further notice.

HaCon Ingenieurgesellschaft mbH
Lister Strasse 15
30163 Hannover
Germany

1 triplInternal with getTariff=profilestring

Instead of triplInternal the usual trip service of the API Server will be used. Two parameters are needed:

- tariff=1 (this turns on the fare module)
- travellerProfileData=profilestring (this is the same JSON string as used in getTariff for triplInternal)

The result will contain TariffResult with fareSetItems and fareItems each containing a list of params as documented in the API Server documentation. All pertinent fare related data will be in these params, much more than was available in old triplInternal request.

Example <https://{{API Server URL}}/trip?accessId={...}&tariff=1&travellerProfileData=%7B%22trf%22%3A%5B%22RK%22%2C%22ST%22%2C%22SP%22%5D%2C%22psg%22%3A%5B%22A%22%2C%22C%22%2C%22P%22%2C%22Y%22%5D%7D&originExtId=8600626&destExtId=8600512>

travellerProfileData = {"trf":["RK","ST","SP"],"psg":["A","C","P","Y"]}

The travellerProfileData JSON structure supports the following input fields.

Parameter	Type	Description
sd	o Integer/String	Sale date for selecting the tariff data set. Format: YYYYMMDD/"YYYY-MM-DD" Default: <TODAY>
bc	o String	<ul style="list-style-type: none">• "CHEAPEST_AVAIL": Return only the cheapest business class available for the journey• "ALL": Return all possible business classes available for the journey Default: "ALL"
trf	o Array of Strings	Tariff types to calculate fares for. <ul style="list-style-type: none">• "RK": Rejsekort• "ST": Single Ticket• "SP": Season Pass• "MT": Multi-Ride Ticket• "FT": Flextrafik• "DO": DSB Orange• "DOF": DSB Orange Fri• "AT": Air Traffic• "PP": Fares via Pricing Proxy• "AOD": Arriva OneDay Default: "RK"
psg	o Array of Strings	Passenger types to calculate fares for. <ul style="list-style-type: none">• "A": Adult

Parameter	Type	Description
		<ul style="list-style-type: none"> "B": Bike "C": Child "D": Dog "H": Handicapped "P": Pensioner "Y": Young Default: "A", "C", "P", "Y", "B"
sp	o	Object with special Season Pass configuration
sp.zonals	o	Allows to specify how to handle situations where both a zonal and a relational season pass are available: "prefer": Only return the zonal season pass "norel": Only return the relational season pass (default)
sp.ignoreMinZones	o	true: Return season pass options (with 2 zones each) if the journey is inside 1 zone (works for Takst Vest and Zealand). false (default): Do not return season passes if the journey is inside 1 zone.
rk	o	Object with Rejskort card information
rk.sn	o	Integer/String Serial number of Rejskort Card (has no effect if "RK" is not included in trf)

2 stRoutes

2.1 With origin and destination

This service will continue to be called stRoutes. An interval search is performed.

Response is contained in an envelop structure. The elements contained at the top level are dialectVersion, serverVersion, requestId, technicalMessages, res or err

The res or err element contained in the envelop structure is the same as the response of the old ReST API. Users of the old ReST API can ignore all other elements and just work with res

Example

```
https://{API Server URL}/stRoutes?accessId={...}&oStop=8600512&dStop=8600611&psgs=%5B%22A%22,%22C%22%5D&&travel_on=20230422&
```

```
https://{API Server URL}/stRoutes?accessId={...}&oStop=479321200&dStop=450564300&psgs=[%22A%22,%22C%22]&travel_on=20230423&format=xml
```

2.2 With origin only (on Zealand only)

This service is called stRoutesAddon. This service does not perform interval search.

Response is contained in an envelop structure. The elements contained at the top level are dialectVersion, serverVersion, requestId, technicalMessages, res or err

The res or err element contained in the envelop structure is the same as the response of the old ReST API. Users of the old ReST API can ignore all other elements and just work with res

Example:

```
https://{API Server URL}/stRoutesAddon?accessId={...}&oStop=8600611&psgs=%5B%22A%22,%22C%22%5D&mode=DSB-2
```

3 spPrice

3.1 With origin and destination, optionally via

This service will continue to be called spPrice. An interval search is performed. The parameter ctxRecon is not supported anymore.

Response is contained in an envelop structure. The elements contained at the top level are dialectVersion, serverVersion, requestId, technicalMessages, res or err

The res or err element contained in the envelop structure is the same as the response of the old ReST API. Users of the old ReST API can ignore all other elements and just work with res

Example

```
https://{API Server URL}/spPrice?accessId={...}&format=json&oaddr=Odense+St.&daddr=Ringstedt+St.&psgs=%5B%22A%22,%22C%22%5D&journey_info=1&sort=frequency-
```

```
https://{API Server URL}/spPrice?accessId={...}&format=json&oaddr=Svendborg+Gymn.&daddr=Ørbæk+Hallen&psgs=%5B%22A%22,%22C%22%5D&issue_on=2023-04-23&journey_info=1&sort=frequency-
```

3.2 With reconstruction context

This service is called spPriceReconstruction. Parameter ctxRecons is supported. Parameters oaddr, daddr, vaddr are not supported. A reconstruction request is performed without interval search.

Response is contained in an envelop structure. The elements contained at the top level are dialectVersion, serverVersion, requestId, technicalMessages, res or err

The `res` or `err` element contained in the `envelop` structure is the same as the response of the old ReST API. Users of the old ReST API can ignore all other elements and just work with `res`.

Example

https://{API Server URL}/spPriceReconstruction?accessId={...}&format=json&psgs=%5B%22A%22%2C%22C%22%2C%22P%22%2C%22V%22%2C%22H%22%2C%22B%22%5D&issue_on=2023-06-12&with_purse=false&journey_info=0&valid_from=2023-06-12&ctxRecons=T%24A%3D1%400%3DVejl%20St.%40L%3D8600073%40a%3D128%40%24A%3D1%400%3DEs-bjerg%20St.%40L%3D8600215%40a%3D128%40%24202306061649%24202306061818%24Re%203354%24%241%24%24%24%24%24%24|3520,3521,3527,3529,3530,3535,3538,3540,3542,3548,3549,3573,3574,3610,3614,3620,3622,3660,3666,3667,3676

4 Others

Confer the WADL of the API Server.

All responses will be contained in an envelope structure. The elements contained at the top level are dialectVersion, serverVersion, requestId, technicalMessages, res or err

The `res` or `err` element contained in the `envelop` structure is the same as the response of the old ReST API. Users of the old ReST API can ignore all other elements and just work with `res`.

Examples:

StStops : `https://{API Server URL}/stStops?accessId={...}&format=xml`

```
convertZones : https://{API Server URL}/convertZones?accessId={...}&if=4&of=8&z=1041,1042,1003,1004&o=1002&d=1040&uc=self&format=json
```

spPriceForZones : <https://{API Server URL}/spPriceForZones?accessId={...}&format=json&zn=5&fs=7>

```
spDailyZonalPrices : https://{API Server URL}/spDailyZonalPrices?accessId={...}&format=xml&fs=7
```

5 PolygonForZone

This service is not part of API Server but a HAITI request, zoneNumber and date.

<HAITI-URL>?style=dsbtarif&reduce=1&getContent=<zoneNumber>&date=<date>

6 Tariff Data Versions

The request for requesting the tariff data versions from the Journey Planner is now a HTTP POST request. The following uses CURL but it may be called via Postman or another HTTP POST tool.

```
curl --location --request POST 'https://rkrp.hafas.cloud/bin/iphone.exe' --  
header 'Accept: application/json' --header 'Content-Type: application/json' --  
data-raw '{  
  "auth": {  
    "aid": "j1sa92pcj72ksh0-web",  
    "type": "AID"  
  },  
  "client": {  
    "id": "DK",  
    "type": "WEB"  
  },  
  "formatted": false,  
  "id": "87g85kuk4w8b9w8x",  
  "lang": "dan",  
  "svcReqL": [  
    {  
      "id": "1|1|",  
      "meth": "ServerInfo",  
      "req": {  
        "getTariffInfo": true  
      }  
    }  
  ],  
  "ver": "1.59"  
}'
```

7 Document History

Date	Version	Author	Remarks
2023-05-31	1.0	Markus Franz	Initial Version
2023-11-22	2.0	Kshitij Kulshreshtha	