

Service API

Salesforce Event Endpoint

26 Jan 2022

simon.bennett@ihasco.co.uk

```
Purpose
Requests
   URL
      QA Environment
      Production Environment (currently disabled)
   Header
   Body
   Restrictions
Responses
   Success
   Validation Errors
      Model
      Example
Request Body
   Root
   PrimaryContact
   SalesRepresentative
```

Enumerations

LineItem

EventType

PriceModel

CourseAccess

CreditPurchase

ProductCode

Examples

<u>User-based Pricing: Activate Service for New Client</u>

<u>User-based Pricing: Activate Service for Existing Client</u>

Open-license: Activate Service for New Client

Open-license: Activate Service for Existing Client

Restricted-license: Activate Service for New Client

Restricted-license: Activate Service for Existing Client

Purpose

This document details usage of iHASCO's *Service API* as currently implemented. The API endpoint described allows activation of LMS services for new and existing iHASCO client accounts in response to Salesforce contract event payloads.

Requests

URL

QA Environment

POST https://service.ga.ihasco.co.uk/salesforce/event

Production Environment (currently disabled)

POST https://service.ihasco.co.uk/salesforce/event

Header

Authorization: Bearer <TBC>
Content-Type: application/json

Body

Request body is JSON (see Request Body)

Restrictions

- Access will be limited by IP address (TBC)
- Rate is limited to 6000 requests / minute

Responses

Success

A successful request will return HTTP 200 (OK), with the following JSON message:

```
["ok"]
```

Validation Errors

Validation errors will return HTTP 422 (Unprocessable Entity), with the following error JSON message:

Model

```
{
    "<PROPERTY_NAME>": [
    "<MESSAGE>"
]
}
```

Example

Request Body

Root			
Property	Rules	Error Message	Notes
EventType	Required	validation.required	
	String (Enum: <u>EventType</u>)	validation.in: <i>enum-list</i>	
PriceModel	Required	validation.required	
	String (Enum: PriceModel)	validation.in:enum-list	
LmsId	Nullable	-	
	Integer	validation.integer	
	Required if EventType is ContractAmended	validation.required	
	Must be an existing iHASCO client ID	validation.exists	
ContractId	Required if EventType is ContractActivated Amended	validation.required	
	String	validation.string	
ContractNumber	Required if EventType is ContractActivated Amended	validation.required	
	Integer	validation.integer	
OrderId	Required if EventType is OrderActivated	validation.required	
	String	validation.string	
OrderNumber	Required if EventType is OrderActivated	validation.required	

	Integer	validation.integer	
StartDate	Required	validation.required	Contract or order
	ISO 8601 calendar date (YYYY-MM-DD)	validation.format:YYYY-MM-DD	start-date
EndDate	Required	validation.required	Contract or order
	ISO 8601 calendar date (YYYY-MM-DD)	validation.format:YYYY-MM-DD	end-date
	Must be after StartDate	validation.after:ContractStartDate	
SourceOpportunityId	Required	validation.required	
	String	validation.string	
AccountId	Required	validation.required	
	String	validation.string	
	Must not be existing iHASCO client Salesforce ID if EventType is ContractActivated	validation.already-exists: <accountid></accountid>	
AccountName	Required	validation.required	
	String	validation.string	
PrimaryContact	Required	validation.required	
	Object (PrimaryContact)		
SalesRepresentative	Required	validation.required	
	Object (SalesRepresentative)		
LineItems	Required	validation.required	Subscription or order
	Object Array (<u>LineItem</u>)	validation.array	items

CreditPurchases Optional -

Object Array (<u>CreditPurchase</u>) validation.array

PrimaryContact		
Property	Rules	Error Message
Id	Required	validation.required
	String	validation.string
FirstName	Required	validation.required
	String	validation.string
LastName	Required	validation.required
	String	validation.string
Email	Required	validation.required
	Email Address String	validation.email-address
Phone	Required	validation.required
	String	validation.string

SalesRepresentative		
Property	Rules	Error Message
FirstName	Required	validation.required
	String	validation.string
LastName	Required	validation.required
	String	validation.string
Email	Required	validation.required
	Email Address String	validation.email-address

LineItem		
Property	Rules	Error Message
Id	Required	validation.required
	String	validation.string
Name	Required	validation.required
	String	validation.string
ContractId	Required if <u>Root</u> .EventType is Contract Amended	validation.required
	Must match Root.ContractId	validation.match:ContractId
ContractNumber	Required if <u>Root</u> .EventType is Contract Amended	validation.required
	Must match Root.ContractNumber	validation.match:ContractNumber
StartDate	Required	validation.required
	ISO 8601 calendar date (YYYY-MM-DD)	validation.format:YYYY-MM-DD
EndDate	Required	validation.required
	ISO 8601 calendar date (YYYY-MM-DD)	validation.format:YYYY-MM-DD
	Must be after LineItem.StartDate	validation.after:LineItem.StartDate
ProductName	Required	validation.required
	Must match 'integer + whitespace + string' if $\underline{\texttt{Root}}$. PriceModel is RestrictedLicense	validation.must-begin-with-integer

ProductCode	Required	validation.required
	Must match enum: ProductCode	validation.in:enum-list
	Must match enum: $\underline{\text{CourseAccess}}$ if $\underline{\text{LineItem.ParentProductCode}}$ is $\underline{\text{IHCBP}}$ and $\underline{\text{Root}}$. $\underline{\text{PriceModel}}$ is $\underline{\text{OpenLicense}}$	validation.in:enum-list
ParentProductCode	Required	validation.required
	String	validation.string
ServiceStartDate	Required	validation.required
	ISO 8601 calendar date (YYYY-MM-DD)	validation.format:YYYY-MM-DD
ServiceEndDate	Required	validation.required
	ISO 8601 calendar date (YYYY-MM-DD)	validation.format:YYYY-MM-DD
	Must be after LineItem.ServiceStartDate	validation.after:LineItem.ServiceStartDate
UserLimit	Required if LineItem.ProductCode is IHUBP and $\underline{\texttt{Root}}.\texttt{PriceModel}$ is UserBased	validation.required
	Integer	validation.integer
	Minimum: 1	validation.min:1
Quantity	Required if LineItem.ProductCode is AccessKEYACA and Root.PriceModel is OpenLicense	validation.required
	Integer	validation.integer
	Minimum: 1	validation.min:1

CreditPurchase		
Property	Rules	Error Message
LineItemId	Required	validation.required
	Must be present in Root . LineItems . *. Id	validation.match:LineItems.*.Id
PurchaseDate	Required	validation.required
	ISO 8601 calendar date (YYYY-MM-DD)	validation.format:YYYY-MM-DD
Quantity	Required	validation.required
	Integer	validation.integer
	Minimum: 1	validation.min:1

Enumerations

EventType

ContractActivated ContractAmended OrderActivated

PriceModel

OpenLicense RestrictedLicense UserBased

CourseAccess

Access1 Access5 Access10 Access20 AccessKEYALL

ProductCode

IHUBP

IHRPM

IHBS

IHCBP

IHCR

ASCB

ASPPU

ASPPV

ASDS

ASSS0

ASTL

IHAS

AccessKEYACA

Access1

Access5

Access10

Access20

AccessKEYALL

IH-RPM-[n]*

^{*} where [n] is an iHASCO course id with a published version or flagged as sell-able

Examples

User-based Pricing: Activate Service for New Client

```
"EventType": "ContractActivated",
"PriceModel": "UserBased",
"ContractId": "8003H000000MYXIQA4",
"ContractNumber": "00081214",
"StartDate": "2022-01-06",
"EndDate": "2030-09-23",
"SourceOpportunityId": "0063H000006c5ZTQAY",
"AccountId": "64ebdf80-6ef7-11ec-8f3c-93de42d531e7".
"AccountName": "Mraz LLC",
"LmsId": null,
"PrimaryContact": {
  "Id": "0033H00000DfF4xQAF",
  "FirstName": "Garry",
  "LastName": "Littel"
  "Email": "nannie.vonrueden@yahoo.com",
  "Phone": "151-818-9505"
},
"SalesRepresentative": {
  "FirstName": "Testing",
  "LastName": "Sales",
  "Email": "testing-sales@example.com",
  "Phone": "+151-818-9505"
},
"LineItems": [
    "Id": "a4V3H011000J4ABUA0",
    "Name": "SUB-0042401",
    "ContractId": "8003H000000MYXIQA4",
    "ContractNumber": "00081214",
    "StartDate": "2022-01-06".
    "EndDate": "2030-09-23",
    "ProductName": "User based Pricing1",
    "ProductCode": "IHUBP",
    "ParentProductCode": "IHUBP",
    "ServiceStartDate": "2022-01-06",
    "ServiceEndDate": "2030-09-23",
    "UserLimit": "63983"
  },
    "Id": "a4V3H011000J4ABUA1",
    "Name": "SUB-0042403",
    "ContractId": "8003H000000MYXIQA4",
    "ContractNumber": "00081214",
    "StartDate": "2022-01-06",
    "EndDate": "2030-09-23",
    "ProductName": "BeSpoke Product",
    "ProductCode": "IHBS",
    "ParentProductCode": "IHUBP",
    "ServiceStartDate": "2022-01-06",
    "ServiceEndDate": "2030-09-23"
```

```
}
]
```

User-based Pricing: Activate Service for Existing Client

```
"EventType": "ContractActivated",
"PriceModel": "UserBased",
"ContractId": "8003H000000MYXIQA4",
"ContractNumber": "00081214",
"StartDate": "2022-01-06",
"EndDate": "2030-09-23",
"SourceOpportunityId": "0063H000006c5ZTQAY",
"AccountId": "aabb12345678",
"AccountName": "Cummings, Predovic and Shanahan",
"LmsId": "965",
"PrimaryContact": {
  "Id": "0033H00000DfF4xQAF",
  "FirstName": "Enrique",
  "LastName": "Hintz",
  "Email": "ike_okon@gmail.com",
  "Phone": "151-818-9505"
"SalesRepresentative": {
  "FirstName": "Testing",
  "LastName": "Sales",
  "Email": "testing-sales@example.com",
  "Phone": "+151-818-9505"
},
"LineItems": [
    "Id": "a4V3H011000J4ABUA0",
    "Name": "SUB-0042401",
    "ContractId": "8003H000000MYXIQA4",
    "ContractNumber": "00081214",
    "StartDate": "2022-01-06",
    "EndDate": "2030-09-23",
    "ProductName": "User based Pricing1",
    "ProductCode": "IHUBP",
    "ParentProductCode": "IHUBP",
    "ServiceStartDate": "2022-01-06",
    "ServiceEndDate": "2030-09-23",
    "UserLimit": "7532"
  },
    "Id": "a4V3H011000J4ABUA1",
    "Name": "SUB-0042403",
    "ContractId": "8003H000000MYXIQA4",
    "ContractNumber": "00081214",
    "StartDate": "2022-01-06",
    "EndDate": "2030-09-23",
     "ProductName": "BeSpoke Product",
    "ProductCode": "IHBS",
    "ParentProductCode": "IHUBP",
    "ServiceStartDate": "2022-01-06",
    "ServiceEndDate": "2030-09-23"
  }
]
```

Open-license: Activate Service for New Client

```
"EventType": "ContractActivated",
"PriceModel": "OpenLicense",
"ContractId": "8003H000000MYEIQA4",
"ContractNumber": "00081212",
"StartDate": "2022-01-06",
"EndDate": "2030-09-23",
"SourceOpportunityId": "0063H000006c5ZTQAY",
"AccountId": "c348be10-6ef5-11ec-8f3c-93de42d531e7",
"AccountName": "Koelpin Group",
"LmsId": null,
"PrimaryContact": {
  "Id": "0033H00000DfF4xQAF",
  "FirstName": "Marquis",
  "LastName": "Swaniawski",
  "Email": "maia_franecki@gmail.com",
  "Phone": "151-818-9505"
},
"SalesRepresentative": {
  "FirstName": "Testing",
  "LastName": "Sales",
  "Email": "testing-sales@example.com",
  "Phone": "+151-818-9505"
},
"LineItems": [
    "Id": "a4V3H000000J4ABUA0",
    "Name": "SUB-0042471",
    "ContractId": "8003H000000MYEIQA4",
    "ContractNumber": "00081212",
    "StartDate": "2022-01-06",
    "EndDate": "2030-09-23",
    "ProductName": "Credit based Pricing",
    "ProductCode": "IHCBP",
    "ParentProductCode": "IHCBP",
    "ServiceStartDate": "2022-01-06",
    "ServiceEndDate": "2030-09-23"
  },
    "Id": "a4V3H000000J4ACUA1".
    "Name": "SUB-0042472",
    "ContractId": "8003H000000MYEIQA4",
    "ContractNumber": "00081212",
    "StartDate": "2022-01-06",
    "EndDate": "2030-09-23",
    "ProductName": "Access ten courses",
    "ProductCode": "Access10",
    "ParentProductCode": "IHCBP",
```

```
"ServiceStartDate": "2022-01-06",
    "ServiceEndDate": "2030-09-23"
  },
    "Id": "a4V3H000000J4ACUA2",
    "Name": "SUB-0042472",
    "ContractId": "8003H000000MYEIQA4",
    "ContractNumber": "00081212",
    "StartDate": "2022-01-06",
    "EndDate": "2030-09-23",
    "ProductName": "Additional course access",
    "ProductCode": "AccessKEYACA",
    "Quantity": 5,
    "ParentProductCode": "IHCBP",
    "ServiceStartDate": "2022-01-06",
    "ServiceEndDate": "2030-09-23"
 }
],
"CreditPurchases": [
 {
    "LineItemId": "a4V3H000000J4ABUA0",
    "PurchaseDate": "2022-01-06",
    "Quantity": "3690"
  }
]
```

Open-license: Activate Service for Existing Client

```
"EventType": "ContractActivated",
"PriceModel": "OpenLicense",
"ContractId": "8003H000000MYEIQA4",
"ContractNumber": "00081212",
"ContractStartDate": "2022-01-06",
"ContractEndDate": "2030-09-23",
"SourceOpportunityId": "0063H000006c5ZTQAY",
"AccountId": "xxyy123456",
"AccountName": "Weimann, Hills and Glover",
"LmsId": "935",
"PrimaryContact": {
  "Id": "0033H00000DfF4xQAF",
  "FirstName": "Lester",
  "LastName": "Rogahn",
  "Email": "aleen.connelly@hotmail.com",
  "Phone": "151-818-9505"
},
"SalesRepresentative": {
  "FirstName": "Testing",
  "LastName": "Sales",
  "Email": "testing-sales@example.com",
  "Phone": "+151-818-9505"
},
"LineItems": [
    "Id": "a4V3H000000J4ABUA0",
    "Name": "SUB-0042471",
    "ContractId": "8003H000000MYEIQA4",
    "ContractNumber": "00081212",
    "StartDate": "2022-01-06",
    "EndDate": "2030-09-23",
    "ProductName": "Credit based Pricing",
    "ProductCode": "IHCBP",
    "ParentProductCode": "IHCBP",
    "ServiceStartDate": "2022-01-06",
    "ServiceEndDate": "2030-09-23"
  },
    "Id": "a4V3H000000J4ACUA1".
    "Name": "SUB-0042472",
    "ContractId": "8003H000000MYEIQA4",
    "ContractNumber": "00081212",
    "StartDate": "2022-01-06",
    "EndDate": "2030-09-23",
    "ProductName": "All Course Access Key",
    "ProductCode": "AccessKEYALL",
    "ParentProductCode": "IHCBP",
```

Restricted-license: Activate Service for New Client

```
"EventType": "ContractActivated",
"PriceModel": "RestrictedLicense"
"ContractId": "8003H000000MYEIQA4",
"ContractNumber": "00081212",
"StartDate": "2022-01-06",
"EndDate": "2030-09-23",
"SourceOpportunityId": "0063H000006c5ZTQAY",
"AccountId": "cdc37900-6ef7-11ec-8f3c-93de42d531e7",
"AccountName": "Maggio - Lueilwitz",
"LmsId": null,
"PrimaryContact": {
  "Id": "0033H00000DfF4xQAF",
  "FirstName": "Skye",
  "LastName": "Schmeler",
  "Email": "aiden.hamill42@gmail.com",
  "Phone": "151-818-9505"
"SalesRepresentative": {
  "FirstName": "Testing",
  "LastName": "Sales",
  "Email": "testing-sales@example.com",
  "Phone": "+151-818-9505"
},
"LineItems": [
    "Id": "a4V3H000000J4ABUA0",
    "Name": "SUB-0042471",
    "ContractId": "8003H000000MYEIQA4",
    "ContractNumber": "00081212",
    "StartDate": "2022-01-06",
    "EndDate": "2030-09-23",
    "ProductName": "40016 At minus cupiditate laudantium.",
    "ProductCode": "IH-RPM-98",
    "ParentProductCode": "IHRPM",
    "ServiceStartDate": "2022-01-06",
    "ServiceEndDate": "2030-09-23"
  },
    "Id": "a4V3H000000J4ACUA0",
    "Name": "SUB-0042472",
    "ContractId": "8003H000000MYEIQA4",
    "ContractNumber": "00081212",
    "StartDate": "2022-01-06",
    "EndDate": "2030-09-23",
    "ProductName": "92036 Alias ducimus qui ab velit adipisci illum minima.",
    "ProductCode": "IH-RPM-100",
    "ParentProductCode": "IHRPM"
    "ServiceStartDate": "2022-01-06",
    "ServiceEndDate": "2030-09-23"
  },
    "Id": "a4V3H000000J4ACUA1",
    "Name": "SUB-0042472",
    "ContractId": "8003H000000MYEIQA4",
```

```
"ContractNumber": "00081212",
      "StartDate": "2022-01-06",
      "EndDate": "2030-09-23",
      "ProductName": "123 Laudantium aspernatur velit consectetur dicta.",
      "ProductCode": "IH-RPM-100",
      "ParentProductCode": "IHRPM",
"ServiceStartDate": "2022-01-06",
      "ServiceEndDate": "2030-09-23"
    }
  ],
  "CreditPurchases": [
      "LineItemId": "a4V3H000000J4ABUA0",
      "PurchaseDate": "2022-01-06",
      "Quantity": "69856"
    },
    {
      "LineItemId": "a4V3H000000J4ACUA1", "PurchaseDate": "2022-01-06",
      "Quantity": "20120"
 ]
}
```

Restricted-license: Activate Service for Existing Client

```
"EventType": "ContractActivated",
"PriceModel": "RestrictedLicense"
"ContractId": "8003H000000MYEIQA4",
"ContractNumber": "00081212",
"StartDate": "2022-01-06",
"EndDate": "2030-09-23",
"SourceOpportunityId": "0063H000006c5ZTQAY",
"AccountId": "yyzz123456",
"AccountName": "Ledner, Gleichner and Hermiston",
"LmsId": "7189"
"PrimaryContact": {
  "Id": "0033H00000DfF4xQAF",
  "FirstName": "Asha",
  "LastName": "Bins",
  "Email": "lucienne_kuvalis78@yahoo.com",
  "Phone": "151-818-9505"
"SalesRepresentative": {
  "FirstName": "Testing",
  "LastName": "Sales",
  "Email": "testing-sales@example.com",
  "Phone": "+151-818-9505"
},
"LineItems": [
    "Id": "a4V3H000000J4ABUA0",
    "Name": "SUB-0042471",
    "ContractId": "8003H000000MYEIQA4",
    "ContractNumber": "00081212",
    "StartDate": "2022-01-06",
    "EndDate": "2030-09-23",
    "ProductName": "3878 Quia perspiciatis nostrum.",
    "ProductCode": "IH-RPM-98",
    "ParentProductCode": "IHRPM",
    "ServiceStartDate": "2022-01-06",
    "ServiceEndDate": "2030-09-23"
  },
    "Id": "a4V3H000000J4ACUA0",
    "Name": "SUB-0042472",
    "ContractId": "8003H000000MYEIQA4",
    "ContractNumber": "00081212",
    "StartDate": "2022-01-06",
    "EndDate": "2030-09-23",
    "ProductName": "12857 Dicta sed minus eveniet sint sit repellat.",
    "ProductCode": "IH-RPM-100",
    "ParentProductCode": "IHRPM"
    "ServiceStartDate": "2022-01-06",
    "ServiceEndDate": "2030-09-23"
  },
    "Id": "a4V3H000000J4ACUA1",
    "Name": "SUB-0042472",
    "ContractId": "8003H000000MYEIQA4",
```

```
"ContractNumber": "00081212",
       "StartDate": "2022-01-06",
       "EndDate": "2030-09-23",
"ProductName": "123 Eum voluptatem fugiat.",
       "ProductCode": "IH-RPM-100",
       "ParentProductCode": "IHRPM",
"ServiceStartDate": "2022-01-06",
       "ServiceEndDate": "2030-09-23"
    }
  ],
  "CreditPurchases": [
       "LineItemId": "a4V3H000000J4ABUA0",
       "PurchaseDate": "2022-01-06",
       "Quantity": "71926"
    },
     {
       "LineItemId": "a4V3H000000J4ACUA1", "PurchaseDate": "2022-01-06",
       "Quantity": "87724"
 ]
}
```