**Current State:**

We have a delivery method CARRY for both WALK\_IN and REPLACEMENT pick requests with a purpose field as SALE for both. The BOPIS order pick request delivery method is PICK with a purpose field as SALE. The Transfer order pick request will have delivery method as SHIP with purpose field as TRANSFER.

**Proposed State:**

Pick preference API needs to provide an option to exclude bins based on the combination of purpose field and delivery method.

For e.g. WALK\_IN and REPLACEMENT pick requests are leveraging the same delivery method as CARRY, and need to have an ability in Pick preference API to exclude the replacement bins for WALK\_IN and exclude WALK\_IN bins for the REPLACEMENT.

Different BOPIS Pick with separate purpose field as PICKUP as well, this will help reporting clearly BOPIS, WALK\_IN and REPLACEMENT based on the pick complete or pick create pubsub messages purpose field.

**Sample current pick preference API snippet**

For WALK\_IN Pick:

 <Request HTTPMethod="POST" URL="https://store.supply-chain.ibm.com/google/v1/pick-preferences">

<Input> {

 "deliveryMethod": "CARRY",

 "purpose": null,

 "defaultInventoryStatus": null,

 "includeLocations": null,

 "excludeLocations": [

 {

 "locationId": "CustomerPickup",

 "zone": null,

 "type": null

 },

 {

 "locationId": "FoH",

 "zone": null,

 "type": null

 },

 {

 "locationId": "PackStaging",

 "zone": null,

 "type": null

 }

 ],

 "stores": [

 "STUSNY02A"

 ]

 }

</Input>

</Request>

For BOPIS Pick:

<Request HTTPMethod="POST" URL="https://store.supply-chain.ibm.com/google/v1/pick-preferences">

<Input> {

 "deliveryMethod": "PICK",

 "purpose": null,

 "defaultInventoryStatus": null,

 "includeLocations": null,

 "excludeLocations": [

 {

 "locationId": "CustomerPickup",

 "zone": null,

 "type": null

 },

 {

 "locationId": "PackStaging",

 "zone": null,

 "type": null

 }

 ],

 "stores": [

 "STUSNY02A"

 ]

 }

</Input>

</Request>

For Transfer Pick:

<Request HTTPMethod="POST" URL="https://store.supply-chain.ibm.com/google/v1/pick-preferences">

<Input> {

 "deliveryMethod": "SHIP",

 "purpose": null,

 "defaultInventoryStatus": null,

 "includeLocations": null,

 "excludeLocations": [

 {

 "locationId": "CustomerPickup",

 "zone": null,

 "type": null

 },

 {

 "locationId": "PackStaging",

 "zone": null,

 "type": null

 }

 ],

 "stores": [

 "STUSNY02A"

 ]

 }

Purpose field is present in the pickRequestCreated and pickRequestCompleted message.Also while invoking Pick Summary details through an API tester.

**Request**:

<Request HTTPMethod="GET" URL="[https://store.supply-chain.ibm.com/google-pp/v1/stores/STUSNY01A/pick-requests/79d557cc-0803-4f60-b8e6-1b8bb30f116a?"/](https://store.supply-chain.ibm.com/google-pp/v1/stores/STUSNY01A/pick-requests/79d557cc-0803-4f60-b8e6-1b8bb30f116a?%22/)>

**Response**:

<Output assignedToUserId="cchikkanna" cancellationRequested="false" cartId="e4bffc90-cf98-4939-920e-60a6aa2aa2f8" completionTimestamp="null" createdTimestamp="2021-06-30T19:47:05.556Z" deliveryMethod="CARRY" expectedCompletionTime="null" expectedShipDate="null" hasShortage="false" includedInBatch="false" lastModifiedTimestamp="2022-04-21T17:18:59.349Z" orderNo="null" pickRequestId="79d557cc-0803-4f60-b8e6-1b8bb30f116a" priority="0" **purpose**="SALE" references="null" requestedBy="Automation" reservationReference="e4bffc90-cf98-4939-920e-60a6aa2aa2f8" shipmentNo="4f74b2d8-34a9-4cbe-981c-cad29108d728" stagingLocationId="FoH" status="NOT\_STARTED" storeId="STUSNY01A" tenantId="google-pp" totalRequestedQuantity="2.0">

<pickTasks activity="PICK" assignedToUserId="cchikkanna" batchNo="null" batchPickId="" completedQuantity="0.0" createdTimestamp="2021-06-30T19:47:05.578Z" exceptions="null" inTransitLocationId="null" inventoryStatus="GOOD" lotNo="null" manufacturedDate="null" orderNo="null" pickRequestId="79d557cc-0803-4f60-b8e6-1b8bb30f116a" pickedQuantity="0.0" productClass="null" productId="GA00126-US" requestProductReferenceId="10" requestedQuantity="2.0" segment="null" segmentType="null" shipmentNo="4f74b2d8-34a9-4cbe-981c-cad29108d728" shortageQuantity="0.0" sourceLocationId="Reg1" sourceLocationSequence="0" status="NOT\_STARTED" storeId="STUSNY01A" tagNo="null" targetLocationId="null" taskId="0caae75a-2ee6-4ec3-907a-1388739f31e8" tenantId="google-pp" type="null" unitOfMeasure="EACH"/>

<requestedProducts batchNo="null" id="5f1b1d4c-1c10-42e7-880a-ab4bc5bc5887" inventoryStatus="GOOD" lotNo="null" manufacturedDate="null" pickRequestId="79d557cc-0803-4f60-b8e6-1b8bb30f116a" productClass="null" productId="GA00126-US" references="null" requestProductReferenceId="10" requestedQuantity="2.0" reservationId="56b48feb-8e2d-4e95-b450-4062ea7dd6cc" segment="null" segmentType="null" serials="null" shortageQuantity="0.0" sourceLocationId="null" storeId="STUSNY01A" tagNo="null" tenantId="google-pp" unitOfMeasure="EACH"/>

</Output>

**Plx message for PickRequestCreated:**

{

 pub\_sub\_id: "4516815700841760",

 message\_attributes: {

 message\_name: pickRequestCreated,

 timestamp: {

 seconds: 1651484209,

 nanos: 685965000

 },

 message\_id: "8ded139f-6199-42be-92e0-c00fd0d12dd5"

 },

 payload: "{

 "priority" : 0,

 "status" : "NOT\_STARTED",

 "storeId" : "STUSNY01A",

 "pickTasks" : [ {

 "productId" : "GA00136-US",

 "unitOfMeasure" : "EACH",

 "inventoryStatus" : "GOOD",

 "productClass" : null,

 "segmentType" : null,

 "segment" : null,

 "taskId" : "82c35a23-bb0e-409c-a0f5-a27a62b1bae0",

 "requestedSerials" : [ ],

 "completedSerials" : [ ],

 "requestedQuantity" : 1.0,

 "shortageQuantity" : 0.0,

 "completedQuantity" : 0.0,

 "sourceLocationId" : "Bin3",

 "targetLocationId" : null,

 "status" : "NOT\_STARTED",

 "requestProductReferenceId" : "10",

 "type" : null,

 "batchPickId" : "",

 "sourceLocationSequence" : 0

 } ],

 "references" : null,

 "pickRequestId" : "f2c3e386-7cea-46fe-a402-531b756b5aa0",

 "requestedProducts" : [ {

 "productId" : "GA00136-US",

 "unitOfMeasure" : "EACH",

 "inventoryStatus" : "GOOD",

 "productClass" : null,

 "segmentType" : null,

 "segment" : null,

 "requestProductReferenceId" : "10",

 "requestedQuantity" : 1.0,

 "reservationId" : null,

 "references" : null,

 "shortageQuantity" : 0.0,

 "sourceLocationId" : null

 } ],

 "hasShortage" : false,

 "lastModifiedTimestamp" : "2022-05-02T09:36:49.681Z",

 "assignedToUserId" : null,

 "createdTimestamp" : "2022-05-02T09:36:49.648Z",

 "orderNo" : null,

 "shipmentNo" : "2334555699121",

 "expectedCompletionTime" : null,

 "**purpose**" : "SALE",

 "requestedBy" : "biyyala",

 "reservationReference" : "23345556011",

 "cartId" : "23345556011",

 "deliveryMethod" : "PICK",

 "cancellationRequested" : false,

 "completionTimestamp" : null,

 "stagingLocationId" : null,

 "expectedShipDate" : null,

 "includedInBatch" : false

}",

 status: PROCESSED,

 retry\_count: 1

}

**Plx Message for PickRequstCompleted:**

{

 pub\_sub\_id: "4513847966381050",

 message\_attributes: {

 message\_name: pickRequestCompleted,

 timestamp: {

 seconds: 1651444898,

 nanos: 950044000

 },

 message\_id: "f6e0bfa8-974c-4ac1-ace8-e77d6f5f11b2"

 },

 payload: "{

 "priority" : 0,

 "pickTasks" : [ {

 "productId" : "GA00494",

 "unitOfMeasure" : "EACH",

 "inventoryStatus" : "DAMAGED",

 "productClass" : "",

 "segmentType" : null,

 "segment" : null,

 "taskId" : "3e8f277b-68ab-4d51-bf95-8c08c97d954a",

 "requestedSerials" : [ ],

 "completedSerials" : [ ],

 "requestedQuantity" : 1.0,

 "shortageQuantity" : 0.0,

 "completedQuantity" : 1.0,

 "sourceLocationId" : "Reg1",

 "targetLocationId" : "PackStaging",

 "status" : "COMPLETED",

 "requestProductReferenceId" : "10",

 "type" : null,

 "batchPickId" : "",

 "sourceLocationSequence" : 0

 } ],

 "references" : {

 "CreatedAtNode" : "Y",

 "OrderHeaderKey" : "2022050122393261401154"

 },

 "storeId" : "STUSNY01A",

 "pickRequestId" : "fd67a4c9-dbd9-47f5-bb3b-23d2bb0672cf",

 "status" : "COMPLETED",

 "reservationReference" : null,

 "cartId" : null,

 "deliveryMethod" : "SHIP",

 "cancellationRequested" : false,

 "completionTimestamp" : "2022-05-01T22:41:38.944Z",

 "stagingLocationId" : null,

 "hasShortage" : false,

 "expectedShipDate" : null,

 "includedInBatch" : false,

 "requestedProducts" : [ {

 "productId" : "GA00494",

 "unitOfMeasure" : "EACH",

 "inventoryStatus" : "DAMAGED",

 "productClass" : "",

 "segmentType" : null,

 "segment" : null,

 "requestProductReferenceId" : "10",

 "requestedQuantity" : 1.0,

 "reservationId" : null,

 "references" : {

 "OrderLineKey" : "2022050122395961401155"

 },

 "shortageQuantity" : 0.0,

 "sourceLocationId" : "Reg1"

 } ],

 "lastModifiedTimestamp" : "2022-05-01T22:41:38.944Z",

 "assignedToUserId" : "montysimtester07",

 "createdTimestamp" : "2022-05-01T22:39:32.785Z",

 "orderNo" : "Y100005374",

 "shipmentNo" : null,

 "expectedCompletionTime" : null,

 "**purpose**" : "TRANSFER",

 "requestedBy" : "SYSTEM"

}",

 status: PROCESSED,

 retry\_count: 1

}