

Prioritizing deals for Ad Pods

Overview

These instructions guide you through how to set up an OpenWrap CTV request to enable Deal Prioritization.

Request Parameters

Parameter	Type	Description	Default value
supportdeals	integer	<p>Request-level parameter that indicates whether OpenWrap should prioritize a deal based on the deal tiers passed in the request. Values are:</p> <ul style="list-style-type: none"><code>true</code> = OpenWrap will prioritize deals based on the deal tiers passed in the request.<code>false</code> = OpenWrap will not consider any deals based on priority. <pre>JSON field = req.ext.wrapper.supportdeals</pre>	false
dealtier	object	<p>An impression-level parameter that specifies bidder specific tier information to be used by OpenWrap in determining if deal bid is satisfying the bidder's deal tier.</p> <p>dealtier has two properties:</p> <ul style="list-style-type: none"><code>mindealtier</code>: The minimum deal priority that a deal bid must have to satisfy the deal tier. It must be great than 0. The higher the value, the higher the priority.<code>prefix</code>: Bidder-specific prefix to be used while forming <code>pwtpb_cat_dur</code> when deal bid satisfies the tier. <pre>dealtier object hierarchy: JSON field = imp[<INDEX>].ext.bidder[<BIDDERNAME>].dealtier</pre>	
includebrandcategory	integer	<p><i>Only for publishers using GAM as the Primary Ad Server.</i></p> <p>Request-level parameter that indicates whether the brand category is included in the targeting key.</p> <ul style="list-style-type: none"><code>0</code> = Indicates bid category is not expected in <code>pwtpb_cat_dur</code>. For example, <code>pwtpb_cat_dur = 10.00_5s</code><code>1</code> = Indicates bid category returned in bid response (by corresponding bidder) is expected. Typically it would be IAB category. For Example, <code>pwtpb_cat_dur = 10.00_IAB-17_5s</code><code>2</code> = Indicates Primary Ad Server defined category (Equivalent of BID IAB Category) is expected. For Example, <code>pwtpb_cat_dur = 10.00_Sports_5s</code> <ul style="list-style-type: none">It performs category translation from Bid Category to equivalent Category defined by Primary Ad ServerToday OpenWrap only holds the category mapping for DFP as primary ad server. We determine your Primary Ad Server from the Profile ID passed in the request <pre>JSON field = req.ext.wrapper.includebrandcategory</pre>	0

Setting up deal prioritization

This section provides steps for setting up deal prioritization without a primary ad server ways:

- Without a primary ad server
- With a primary ad server

Set up without a primary ad server

Use this set up method if you want to prioritize deals without a primary ad server.

Endpoints:

/video/openrtb	Returns ad pod response in OpenRTB Format.
/video/vast	Returns ad pod response in VAST XML Format.

 See [OpenWrap CTV Video API Specification](#) for more information.

Pass `supportdeals = true` in the request-level wrapper extension object of the OpenWrap Ad Pod request, as follows:

POST request

```
{
  "imp": [],
  "ext": {
    "wrapper": {
      "supportdeals": true
    }
  }
}
```

GET request

```
/video/openrtb?req.ext.wrapper.supportdeals=true
/video/vast?req.ext.wrapper.supportdeals=true
```

Pass the `dealtier` information in the impression-level bidder extension of the OpenWrap Ad Pod request, as follows:

1. Replace `<BIDDER_PREFIX>` with a string value bidder-specific prefix required for deal tiering.
2. Replace `<MINIMUM_REQUIRED_DEAL_PRIORITY>` with an integer value greater than 0.

POST request

```
{
  "imp": [{
    "ext": {
      "bidder": {
        "bidder1": {
          "dealtier": {
            "prefix": "<BIDDER_PREFIX>",
            "mindealtier": <MINIMUM_REQUIRED_DEAL_PRIORITY>
          }
        },
        "bidder2": {
          "dealtier": {
            "prefix": "<BIDDER_PREFIX>",
            "mindealtier": <MINIMUM_REQUIRED_DEAL_PRIORITY>
          }
        }
      }
    }
  }]
}
```

GET request

```
imp[<INDEX>].ext.bidder=encodeURIComponent('{"bidder1":{"dealtier":{"prefix":"<BIDDER_1_PREFIX>","mindealtier":<MINIMUM_REQUIRED_DEAL_PRIORITY> }}, "bidder2":{"dealtier":{"prefix":"<BIDDER_2_PREFIX>","mindealtier":<MINIMUM_REQUIRED_DEAL_PRIORITY>}}}')
```

```
// Output - %7B%22bidder1%22:%7B%22dealtier%22:%7B%22prefix%22:%22%3CBIDDER_1_PREFIX%3E%22,%22mindealtier%22:%3CMINIMUM_REQUIRED_DEAL_PRIORITY%3E%20%7D%7D,%22bidder2%22:%7B%22dealtier%22:%7B%22prefix%22:%22%3CBIDDER_2_PREFIX%3E%22,%22mindealtier%22:%3CMINIMUM_REQUIRED_DEAL_PRIORITY%3E%7D%7D%7D
```

(Optional) In this sample, we used `includebrandcategory` to include a bid category (1 = IAB bid category) in the request-level wrapper extension object of the OpenWrap Ad Pod request:

POST request

```
{
  "imp": [],
  "ext": {
    "wrapper": {
      "includebrandcategory": 1
    }
  }
}
```

GET request

```
/video/openrtb?req.ext.wrapper.includebrandcategory=1
/video/vast?req.ext.wrapper.includebrandcategory=1
```

Sample Request

In this sample (using `debug = 1`), AppNexus is passed as the bidder with a minimum deal tier priority of 4. This means deals with a priority that is greater than or equal to 4 must be considered as satisfying the deal tier.

POST request

```
{
  "imp": [{
    "ext": {
      "bidder": {
        "appnexus": {
          "dealtier": {
            "prefix": "apnx",
            "mindealtier": 4
          }
        }
      }
    }
  }],
  "ext": {
    "wrapper": {
      "supportdeals": true
    }
  }
}
```

 Pass debug=1 to get the debug object inside extension.

Debug attribute	Description	Value
dealtiersatisfied	Represents whether corresponding deal bid has satisfied the tier. Note: This is not applicable for /video/vast endpoint	True = deal bid has satisfied the deal tier If attribute is empty = deal tier was not satisfied
dealpriority	The deal bid priority returned by the bidder. Note: This is not applicable for /video/vast endpoint	Non-zero positive value = priority of the deal bid 0 = attribute will not be present

Sample response

Response has `seatbid.bid` object representing Ad Pod.

In this example, `dealtiersatisfied = true` indicates the deal bid has satisfied the deal tier. `dealpriority` indicates a deal bid priority of 9.

Sample response

```
{
  "id": "1559039248176",
  "seatbid": [{
    "bid": [{
      "id": "9f12b1b0-18b3-43fd-bef3-e228ead461df",
      "impid": "28635736ddc2bb1",
      "price": 9.970912454221653,
      "adm": "<Ad Contents>",
      "adomain": [""]
    }],
    "seat": "prebid_ctv"
  }],
  "cur": "USD",
  "ext": {
    "debug": {
      "adpod": {
        "bidresponse": {
          "id": "1559039248176",
          "seatbid": [{
            "bid": [{
              "price": 7.859015151412768,
              "ext": {
                "partner": "appnexus",
                "prebid": {
                  "targeting": {
                    "pwtpb": "1.00",
                    "pwtpb_cat_dur": "apnx9_30s"
                  },
                  "dealtiersatisfied": true,
                  "dealpriority": 9
                }
              }
            }],
            "price": 2.111897302808885,
            "ext": {
              "partner": "appnexus",
              "prebid": {
                "targeting": {
                  "pwtpb": "1.00",
                  "pwtpb_cat_dur": "2.1_30s"
                }
              }
            }
          }],
          "seat": "appnexus"
        }
      }
    }
  }
}
```

Set up using a primary ad server

Use this set up method if you are using a primary ad server and want to compete for programmatic and guaranteed demand.

Endpoint:

[/video/json](#) This endpoint returns targeting keys along with its values. It will not return an actual ad pod.



See [OpenWrap CTV Video API Specification](#) for more information.

In this example, we will be looking for `pwtpb_cat_dur` as one of the targeting key in the Ad Response.



pwtpb_cat_dur - Provision for deal prioritization

Is a targeting key returned by OpenWrap video/json endpoint. It is equivalent to Prebid Server's `hb_pb_cat_dur`

It is interpreted as:

`pb` = price bucket of the bid

`cat` = bid category

`dur` = duration of video bid.

For example, `pwtpb_cat_dur = 10.00_sports_5s` indicates the bid as \$10.00, belonging to the IAB Sports category, and has a duration of 5 seconds.

Changes for deal prioritization

When deal prioritization is requested, OpenWrap replaces `pb` with the deal tier prefix and deal priority for the deal bids satisfying the deal tier.

For example, a deal bid is returned by the bidder:

Bid Price	Bid Category	Bid Priority	Duration
\$10.00	IAB-17 (Sports)	9	5 seconds

The above deal bid satisfied the following bidder's deal tier:

Prefix	Minimum Deal Priority
apnx	4

In this case `pwtpb_cat_dur` will be changed as follows:

Old Value	New Value
10.00_sports_5s	apnx9_sports_5s

The new value indicates the bid with deal priority 9 has satisfied the bidder's deal tier, it belongs to IAB Sports category, and has a duration of 5 seconds.

`pwtpb_cat_dur` will be then used by the primary ad server as key-value targeting in the line item setup. This will ensure line items that represent corresponding deal are getting prioritized in auction of primary ad server.

Pass `supportdeals = true` in the request-level wrapper extension object of the OpenWrap Ad Pod request, as follows:

POST request

```
{
  "imp": [],
  "ext": {
    "wrapper": {
      "supportdeals": true
    }
  }
}
```

GET request

```
/video/openrtb?req.ext.wrapper.supportdeals=true
/video/vast?req.ext.wrapper.supportdeals=true
```

Pass the `dealtier` information in the impression-level bidder extension of the OpenWrap Ad Pod request, as follows:

1. Replace <BIDDER_PREFIX> with a string value bidder-specific prefix required for deal tiering.
2. Replace <MINIMUM_REQUIRED_DEAL_PRIORITY> with an integer value greater than 0.

POST request

```
{
  "imp": [{
    "ext": {
      "bidder": {
        "bidder1": {
          "dealtier": {
            "prefix": "<BIDDER_PREFIX>",
            "mindealtier": <MINIMUM_REQUIRED_DEAL_PRIORITY>
          }
        },
        "bidder2": {
          "dealtier": {
            "prefix": "<BIDDER_PREFIX>",
            "mindealtier": <MINIMUM_REQUIRED_DEAL_PRIORITY>
          }
        }
      }
    }
  }]
}
```

GET request

```
imp[<INDEX>].ext.bidder=encodeURIComponent('{"bidder1":{"dealtier":{"prefix":"<BIDDER_1_PREFIX>","mindealtier":<MINIMUM_REQUIRED_DEAL_PRIORITY> }}, "bidder2":{"dealtier":{"prefix":"<BIDDER_2_PREFIX>","mindealtier":<MINIMUM_REQUIRED_DEAL_PRIORITY>}}}')
```

```
// Output - %7B%22bidder1%22:%7B%22dealtier%22:%7B%22prefix%22:%22%3CBIDDER_1_PREFIX%3E%22,%22mindealtier%22:%3CMINIMUM_REQUIRED_DEAL_PRIORITY%3E%20%7D%7D,%22bidder2%22:%7B%22dealtier%22:%7B%22prefix%22:%22%3CBIDDER_2_PREFIX%3E%22,%22mindealtier%22:%3CMINIMUM_REQUIRED_DEAL_PRIORITY%3E%7D%7D%7D
```

(Optional) In this sample, we used includebrandcategory to include a bid category (1 = IAB bid category) in the request-level wrapper extension object of the OpenWrap Ad Pod request:

POST request

```
{
  "imp": [],
  "ext": {
    "wrapper": {
      "includebrandcategory": 1
    }
  }
}
```

GET request

```
/video/openrtb?req.ext.wrapper.includebrandcategory=1
/video/vast?req.ext.wrapper.includebrandcategory=1
```

Sample Request

In this sample (using `debug = 1`), AppNexus is passed as the bidder with a minimum deal tier priority of 4. This means deals with a priority that is greater than or equal to 4 must be considered as satisfying the deal tier.

POST request

```
{
  "imp": [{
    "ext": {
      "bidder": {
        "appnexus": {
          "dealtier": {
            "prefix": "apnx",
            "mindealtier": 4
          }
        }
      }
    }
  }],
  "ext": {
    "wrapper": {
      "supportdeals": true
    }
  }
}
```

 Pass `debug=1` to get the debug object inside extension.

Debug attribute	Description	Value
dealtiersatisfied	Represents whether corresponding deal bid has satisfied the tier. Note: This is not applicable for <code>/video/vast</code> endpoint	True = deal bid has satisfied the deal tier If attribute is empty = deal tier was not satisfied
dealpriority	The deal bid priority returned by the bidder. Note: This is not applicable for <code>/video/vast</code> endpoint	Non-zero positive value = priority of the deal bid 0 = attribute will not be present

Sample response

Response has `seatbid.bid` object representing Ad Pod.

In this example, `dealtiersatisfied = true` indicates the deal bid has satisfied the deal tier. `dealpriority` indicates a deal bid priority of 9.

Sample response

```
{
  "adpods": [{
    "id": "impl76227948",
    "targeting": [{
      "pwtbst": "1"
    }]
  }],
  "ext": {
    "debug": {
      "adpod": {
        "bidresponse": {
          "id": "1559039248176",
          "seatbid": [{
            "bid": [{
              "price": 7.859015151412768,
              "ext": {
                "partner": "appnexus",
                "prebid": {
                  "targeting": {
                    "pwtpb": "1.00",
                    "pwtpb_cat_dur": "apnx9_30s"
                  },
                  "dealtiersatisfied": true,
                  "dealpriority": 9
                }
              }
            ]
          }],
          "seat": "appnexus"
        }],
        "cur": "USD"
      }
    }
  }
}
```

Failure scenarios

If the bid response does not have a category	Then the bid will be rejected by OpenWrap when <code>includebrandcategory = 1</code> or <code>2</code>
If the same <code>bid.id</code> is returned by a bidder in case of multiple bids response	Then the bid will be rejected by OpenWrap when <code>includebrandcategory = 1</code> or <code>2</code>

FAQs

Question: Partner / Bidder not responded with creative duration

Answer: In such a case `pwtpb_cat_dur` will be populated using corresponding impression level max duration value. Hence, the actual ad duration may not match with the max duration

Question: How does category or advertiser exclusion works when a deal bid satisfies the deal tier?

Answer: There are two possibilities:

- A combination containing the highest number of deal bids, that satisfied the deal tier, will be selected on priority and then an exclusion algorithm will be applied on top of it
- Deal bids which satisfied the deal tier will be preferred on top of other bids. These deal bid buckets will also be sorted based on bid price.

Question: Will `pwtpb_cat_dur` key be populated if deal bid not satisfied the tier?

Answer: Yes, if `supportdeals = true` for any winning bid, this key will be populated. However, it will contain the actual price bucket of the given bid, instead of deal tier prefix + deal priority.