



# Clearing Process

Issued March 2019

# Pricing Strategy

From 2019 onwards, WPD will implement a new pricing strategy, which we see as having three distinct phases.

For 2019 Procurement cycle 1, we expect most zones to continue on a fixed price basis, however where there is sufficient competition, we will move towards the Phase 2 stage for the Secure & Dynamic products.

During Procurement cycle 1 our Restore product will remain fixed price.

## Phase 1 Fixed

- Where the procurement process finds there is not a sufficient amount of flexibility to provide a competitive market, then we will continue to use a fixed price in that zone.
- This will be set at around £300/MWh for the contract.

## Phase 2 Pay-as-Clear

- Where there is sufficient competition within flexibility, the procurement process will derive a clearing price for the zone to be used in the contract.
- This will be based on the highest price submitted by the group of lowest priced participants that can meet the full amount of system needs, including redundancy.

## Phase 3 Full Market

- As the liquidity in distribution flexibility markets improves and our visibility, procurement, dispatch and settlement systems mature, we will shorten the length of the window for which the contract price applies to.
- This will be a progression towards close to real-time market operation.

# Pricing – Phase 1 fixed

We have calculated a maximum fixed price for flexibility within our **Constraint Management Zones (CMZs)** based on cost efficiency.

Our fixed prices are operating at...

	<b>Arming</b>	<b>Availability</b>	<b>Utilisation</b>
<b>Secure</b>	£125/MWh	N/A	£175/MWh
<b>Dynamic</b>	N/A	£5/MWh	£300/MWh
<b>Restore</b>	N/A	N/A	£600/MWh

The fixed prices for Secure & Dynamic will only be applicable to CMZs that do not have multiple flexibility providers with a total capacity that exceeds the CMZs needs.

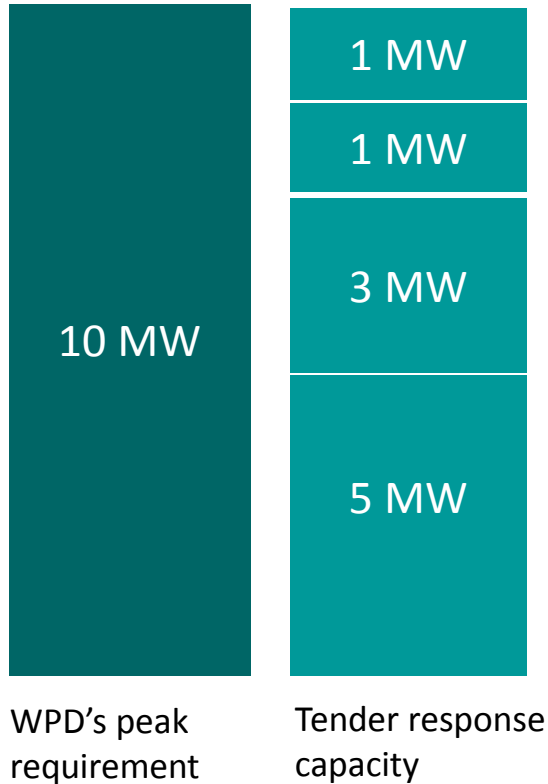
Note: During Procurement Cycle 1, Restore product pricing will remain fixed.

# Pricing – Phase 2 Pay-as-clear

- Tenderers will also be asked to provide their ‘best and final offer’ per MWh of combined availability/arming & utilisation (A & U).
- The combined price is split as per the fixed price product ratios; Secure – A41.5% U58.5%, Dynamic – A1.6% U98.4%
- Where we have CMZs with multiple flexibility providers with a total capacity that exceeds the CMZs needs the ‘best and final offer’ price will be used to determine a zonal clearing price.
- The zonal clearing price will be deemed to be the CMZs best market price, and this price will then be offered to all tenderers.
- Tenderers whose best and final offer is above the clearing price will be awarded a contract at the zonal clearing price. Tenderers are under no obligation to provide services under the contract.
- We will carry out an N-2 test\* to determine which zones have enough participation to be applicable for clearing.

\*An N-2 test consists of removing any combination of 2 tendering parties from the group of tendering parties and assessing if the peak needs of the CMZ can still be met.

# Clearing – scenario 1

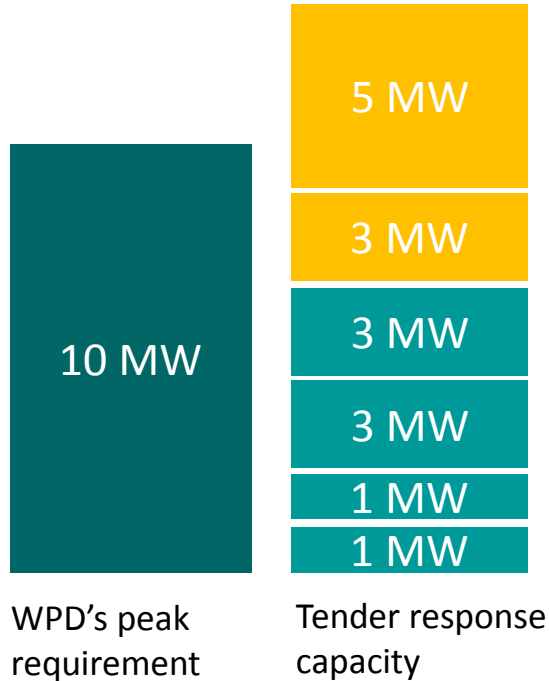


The total capacity of tender responses meets of MW peak.

**In this scenario the tenderers would be awarded a contract on the fixed price.**

Note: We may chose to re-open the procurement within the year in order to achieve additional redundancy or future flexibility.

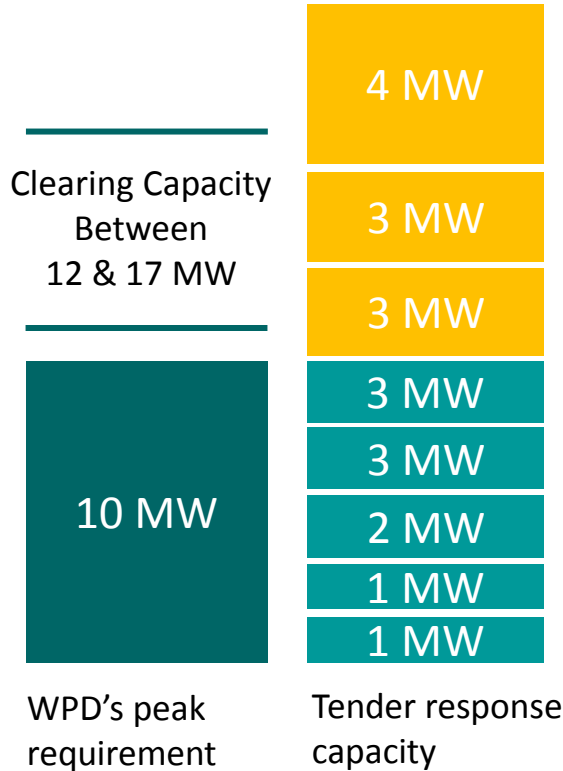
## Clearing – scenario 2



The total capacity of tender responses exceeds the MW peak, however if we were to remove the two largest providers under the N-2 test we cannot meet the peak.

**In this scenario the tenderers would be awarded a contract on the fixed price.**

# Clearing – scenario 3

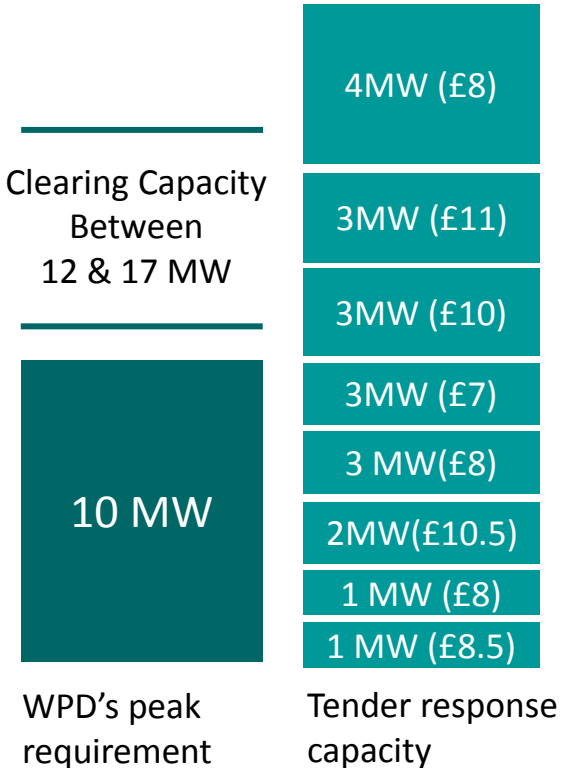


In this scenario we have multiple responses that exceed our requirement . If we stack all responses in order of size we see that this group passes the N-2 test; any 2 of the providers can be removed without compromising delivery of service.

They will now go on to establish the zones clearing capacity.

**In this scenario the tenderers will go on to our clearing process.**

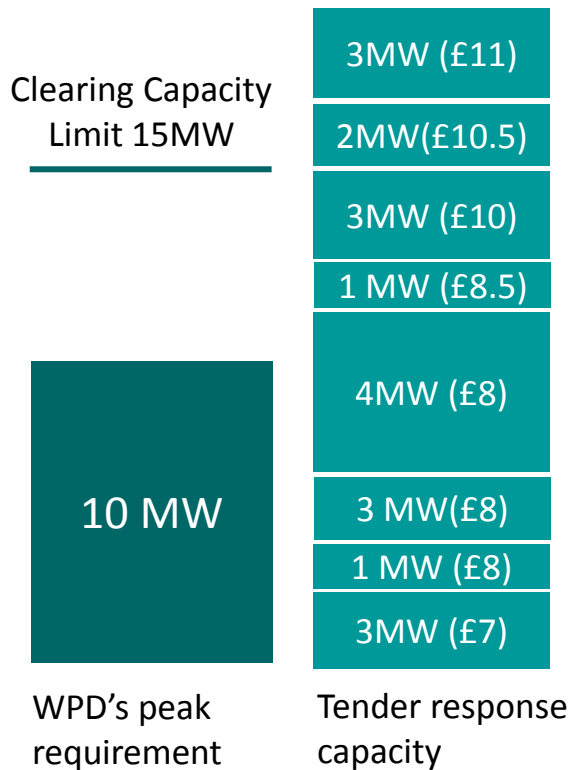
# Clearing – scenario 3



The clearing process must now take into account the prices provided by the tenderers.

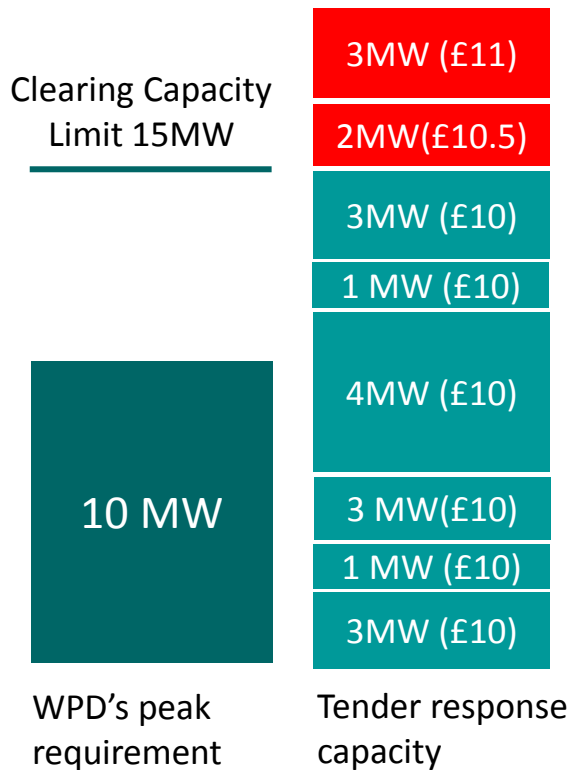


# Clearing – scenario 3



N-2 has been applied to tenderers sorted in ascending price order. Clearing capacity limit has been found to be 15MW and the zonal price clears at £10.

# Clearing – scenario 3



Zonal price is set at £10.

All providers, above and below the clearing capacity limit, will be awarded a contract at the zonal price.

Providers who are above the clearing capacity limit will only be dispatched if the system needs exceed the flexibility offered by those within the clearing capacity. This means that any tenderers who have submitted a best and final offer above the zonal clearing price will only be utilised where there is not enough capacity from tenderers who submitted a lower clearing price. These will be dispatched in order of the price submitted during the procurement.

# Fair Dispatch Principles

As WPD will be operating a pay-as-clear pricing structure, there will be no differentiation in price, however there will be optimisations it can make by dispatching the participants in an order which most closely aligns to the required flexibility.

WPD will consider the following factors to optimise our dispatch:

## Fairness

- We will share the dispatch of utilisation across all providers offering availability

## Competitive

- Acceptance of availability will be shared across the largest number of providers

## Operability

- Providers offering greater operability will maximise their chance of participation

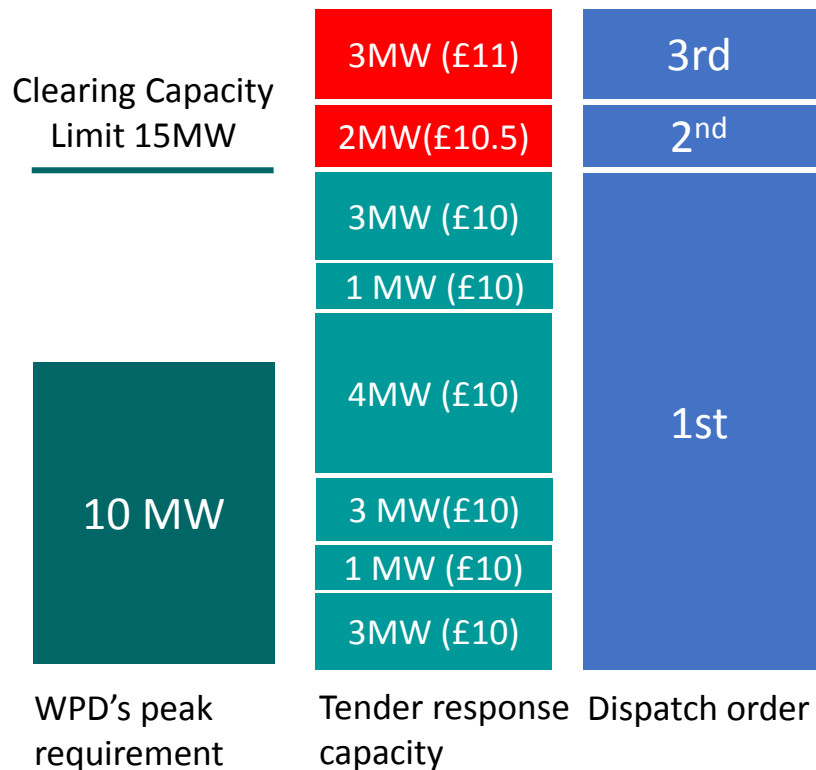
## Security

- The needs of the system will be met using flexibility in such a way that supply of security is maintained

## Value

- Flexibility will be operated to meet system needs with the minimum level of over-procurement

# Price Order Dispatch



Providers who are above the clearing capacity limit will enter into contracts at the zonal price, but will only be dispatched if the system needs exceed the flexibility offered by those within the clearing capacity. This means that any tenderers who have submitted a best and final offer above the zonal clearing price will only be utilised where there is not enough capacity from tenderers who submitted a lower clearing price.

These will be dispatched in order of price submitted during procurement. For example, here we see that the participants that bid at the zonal price will be dispatched first, provided they have made their assets available at the time of requirement.

If the CMZ still has unfulfilled requirements then tenderers that bid above the zonal price will be dispatched in bid price order, at the zonal price.