Response to Discussion Paper

Central counterparty default management auctions

August 2019

Singapore Exchange

Contents

I Introduction

Singapore Exchange Limited ("**SGX**") welcomes the opportunity to respond to the Discussion Paper on Central Counterparty Default Management Auctions published by the Committee on Payments and Market Infrastructures and the Board of the International Organization of Securities Commissions in June 2019 for comment by 9 August 2019.

II Statement of Interest

SGX is the holding company of The Central Depository (Pte) Limited ("**CDP**") and the Singapore Exchange Derivatives Clearing Limited ("**SGX-DC**"), which are regulated as Approved Clearing Houses for the securities and derivatives markets respectively pursuant to the Securities and Futures Act ("**SFA**") and its subsidiary legislation, i.e. Securities and Futures (Clearing Facilities) Regulations 2013. CDP, which operates as a central counterparty to clear equities and corporate debt securities, also functions as a securities settlement system and central securities depository. SGX-DC functions as a central counterparty to clear derivative products listed on the Singapore Exchange Derivatives Trading as well as over-the-counter commodities products and financial derivatives.

III Response to Discussion Paper

The views expressed below by SGX-DC on this matter are consistent with those of exchanges and clearing houses trade associations that SGX-DC maintains membership status (i.e. WFE and CCP12).

Role and responsibilities (Chapter 3)

Question 1: What are the considerations for a CCP's board when determining whether and how to assign tasks related to the planning and conduct of default management auctions within the CCP's risk management framework? How does the CCP's board identify potential limits to the assigned responsibilities?

1.1 A key tenet is that a CCP must be able to swiftly respond to a default scenario and must be able to act autonomously within defined principles and boundaries set by its board.

1.2 A CCP's board would generally be unable to be practically involved in real-time default management. Instead, there should be pre-set escalation and communication procedures to ensure that the Board is kept apprised and can contribute where appropriate.

1.3 The CCP's board should vet and approve each CCP's overall risk management framework, including but not limited to its capital adequacy, clearing fund contributions, general risk appetite and recovery and resolution plans, so that there is consensus in peacetime. Early warning thresholds should be set to impose additional margin requirements to mitigate any default risk.

1.4 It would also be useful for the CCP's board to delegate its duties to certain management and working level responses teams. These teams should then flow developments to the board where necessary.

Question 2: What different considerations may apply when a CCP's board establishes procedures for consulting external experts, such as independent consultants or clearing members, when designing or conducting a default management auction? How does a CCP's board address such concerns?

1.5 Engagement of external experts, including industry participants and clearing members, is generally done in the design phase. The input of such parties through private and public consultations help shape the CCP's rules and procedures in respect of the auction process.

1.6 The CCP would ultimately exercise its discretion in crafting a neutral auction process that incentivises participants to achieve the objective of restoring a matched book. The auction process should be approved by its board as being a viable default management and recovery tool.

1.7 Principles and procedures in accordance with which an auction should be conducted should be pre-agreed with external stakeholders (including clearing members and regulators) and made available to participants (e.g. through inclusion in a rulebook).

1.8 In the event where a CCP elects to include external stakeholders, such arrangement should be *ex ante*. Such external stakeholders should participate in the regular fire-drill organised by the CCP, to ensure that they are familiar with the procedures undertaken by the CCP.

1.9 Ultimately, even though industry and external involvement is ideal in certain scenarios (e.g. where there are complex portfolios of non-linear products), it is imperative that a CCP has the flexibility to deal with a default on an operational basis given that time is of the essence.

Considerations for a successful auction (Chapter 4)

Question 3: Do you agree with the description of a successful auction in the discussion paper? Do you agree with the scenarios identified that would constitute an unsuccessful auction, and are there additional such scenarios?

1.10 Price, time and market conditions are arguably the key factors around what constitutes a successful auction.

1.11 Ensuring that the bidder is able to fulfil its obligation as the auction winner is another key factor. The auction winner is required to take over the auction portfolio, from both risk and operational perspectives.

1.12 A CCP seeks to restore a matched book as swiftly as possible, while achieving reasonable prices that best protect the economic interests of market participants. The CCP also aims to minimise any disruption to the continued operation of a fair and orderly market and a safe clearing facility.

1.13 It is generally agreed that the scenarios identified (i.e. no bids or bids being too low) would constitute an unsuccessful auction.

1.14 Although an auction may be initially successful, there may be extenuating circumstances that led to an unsuccessful result. For instance, a remote scenario lies in the potential failure on the part of the winning bidder to subsequently fulfil its obligations to take over the defaulter's positions due to unforeseen circumstances (e.g. extreme price volatility).

Question 4: What are the primary challenges to achieving a successful default auction? In addition to those included in the discussion paper, are there other elements in the design of an auction that a CCP could consider in order to increase the likelihood of a successful auction?

1.15 In any market stress event, above all else, time is of the essence for a CCP to be effective in a default management process. There is significant time pressure for the CCP to communicate its actions and requirements to participants, and then for participants to react within the prescribed timelines. Where a particular member default impacts more than 1 CCP simultaneously, this becomes exponentially even more challenging for affected CCPs and participants to default manage.

1.16 The CCPs are likely to conduct auctions for contracts in the time-zone where price discovery is at its most robust and where market participants can effectively hedge risks in the underlying cash markets. For example, for CCPs that clear products with underlying cash markets situated in Asia, the auction will likely be conducted during the Asian time-zone.

1.17 Other than time pressure, the prevailing market conditions and the size of the defaulter's portfolio are likely to have significant bearings on the CCP's ability to achieve a successful auction, especially because these are external factors beyond a CCP's control.

1.18 Volatile market conditions would have a big impact on the willingness and appetite of auction participants to absorb risk without significant premiums, and hence widen bid-offer spreads on pricing the defaulter's portfolio.

1.19 Similarly, the size and complexity of the defaulter's portfolio may also present challenges for auction participants, in terms of their ability to take on a potentially large size portfolio and timeliness to assess & bid on a complex portfolio with thousands of line items.

1.20 As different CCPs may have differing auction procedures, familiarity by market participants with the auction procedures of respective markets is another consideration. It is therefore important for CCPs to carry out regular fire drills exercises for quicker and more effective default management resolution during a crisis.

Question 5: What process/set of factors, including applicable governance, is used/considered to determine whether an auction is successful or unsuccessful? What governance would apply to this determination, including the decision whether to run an additional auction (as opposed to using other tools) and why?

1.21 The following factors are considered on whether an auction is successful:

a) ability of participants to comply with auction procedures and timelines (set ex ante), especially in an actual market stress event;

b) competitive bids submitted by most if not all required participants within prescribed timelines;

c) expeditious completion of auction within timeline, without re-run;

d) minimum impact on clearing fund and members' financial condition;

e) regular and prompt communication / updates to participants, or market (where appropriate) to allay investor concerns and maintain market confidence.

1.22 To elaborate, there are clear auction procedures and timelines stipulated for each auction (i.e. auction date, commencement time, expiration time of when the last bid will be accepted, conclusion of the auction.) Once deadline of the auction has arrived, no further bids will be eligible.

1.23 For a successful auction, CCP could examine the bids and determine the highest bidder as the winner of the auction. As a sanity check, the bid could be checked against an indicative fair value computed by the CCP or a default management workgroup comprising market practitioners for the auction portfolio.

1.24 Any deviation from the process (i.e. to determine an unsuccessful auction) will be escalated to the CMT in accordance with the governance framework. As far as possible, a CCP should refrain from running a second auction with the same portfolio. Considerations could include:

a) awarding to the highest bidder would lead to instability of either the bidder or CCP;

b) market conditions are such that participants are unable to submit appropriate bids and conducting a re-auction will attract more appropriate bids, this could also include re-sizing of the auction portfolio;

c) winning bid and the rest of the bids could be very far apart, or the indicative portfolio value suggests that CCP to receive $X but all the bids suggests that the CCP to pay rather than to receive, which could be an indication of inappropriate bids.

1.25 We also need to weigh the potential issues of a re-run auction:

a) market conditions for a re-run;

b) would re-run really result in better prices;

c) how to incentivise participants to bid again;

d) information leakage resulting in potential front running;

e) information leakage on prolonged auction process affecting investor/market confidence.

Question 6: What are the considerations for CCPs in choosing to utilise auctions as a default management tool? What product categories are most suitable for auctions and what product categories are least suitable for auctions? How do you assess suitability?

1.26 Contracts that are suited for auctions would include:

a) contracts with strong portfolio effect such as futures and options;

b) commodities derivatives that are commonly traded as calendar spread.

Where a portfolio consists of options (sharing same underlyings as futures) and have non-linear exposures, there may be additional considerations such as number of participants affected (fewer participants could result in less competitive bids), impact of breaking netting sets.

1.27 Outright futures can most likely be liquidated on screen more expeditiously and need not be subjected to the auction process. Nonetheless, the CCP should retain the flexibility to decide whether auction could be a relevant recovery tool in the case of listed derivatives (for example, outright futures only). Considerations include events where the defaulted portfolio is concentrated which could drive the market unfavourable if liquidated on-screen.

1.28 Number of participants (including end clients) may also be a factor of consideration.

Question 7: In addition to those outlined in the discussion paper, are there other considerations that may be useful for a CCP to take into account when designing its hedging strategy, including circumstances where a CCP may wish to delay hedging?

1.29 Other considerations would include the availability of the defaulted member's collateral. Hedging of the defaulted portfolio would seek to reduce the directional risk.

1.30 In the event where the CCP invites clearing participants to be involved in its hedging process as a default manager, i.e. executing trades on behalf of the CCP. Such clearing participants should adhere to terms and conditions as agreed ex-ante with the CCP. This include confidentiality clauses where the clearing participants will not be allowed to disclose any confidential information received in its capacity as a default manager for the CCP.

Question 8: How do you incorporate cross-margining arrangement considerations in the hedging strategy and in the broader auction design process?

1.31 Not applicable for SGX as it does not clear any products that are cross-margined between two CCPs.

Question 9: The discussion paper notes that, with respect to hedging, execution methods vary and depend on a CCP's choice of hedging instruments. What methods are used for hedging, and what is the rationale for implementing (or not implementing) a particular method?

1.32 While hedging for outright futures is straightforward, our view is that direct liquidation takes precedence where the portfolio consists of outright futures positions only. Hedging will be applicable as an immediate priority to reduce the directional risk of the defaulted portfolio. For example, when a portfolio comprises of option positions, the CCP will have to consider the need to hedge the gamma, vega risk.

1.33 To execute such hedging and direct liquidation of a portfolio of exchange-traded derivatives contracts, the preferred method is likely to enter relevant orders in the central limit order book or via an off-exchange block trade (as may be applicable for a large trade size).

Question 10: What factors, other than those identified in the discussion paper, do you see as relevant when determining how to split a portfolio? Are there situations where certain factors would be more important than others? Please provide examples.

1.34 In addition to the criteria identified on portfolio splitting (i.e. size, volume of trades, asset class, product type, segment, currency, maturity, netting sets and cross-margining arrangements), liquidity conditions around market timing, operational ease in conducting multiple auctions should be factors to be considered.

1.35 This is particularly relevant for products where adequate market liquidity may be constrained by operating time-zones e.g. lack of liquidity when the product's underlying market is closed for trading.

1.36 Prior to splitting the portfolio, the CCP would have to evaluate if doing so changes the risk profile of the portfolio. Clarity on whether the auction is for a single portfolio or split portfolios should be provided to the clearing members in the event where mandatory bidding is required from the membership.

Question 11: The discussion paper describes two common auction formats. Are there other auction formats not included that could be beneficial for a CCP to consider employing? What factors influence the decision to implement (or not implement) a particular auction format?

a. Besides promoting competitive bidding, are there other considerations for choosing two-way pricing? Are there circumstances where it would be beneficial or circumstances where it might not be appropriate? If so, please describe.

1.37 Two-way pricing might not be appropriate for an auction portfolio where it comprises of (i) both long and short positions, and (ii) futures and options positions.

1.38 Members might be faced with operational constraints to provide quotes for multiple portfolios.

1.39 Two-way pricing might be appropriate for outright portfolio comprising of all longs, or all shorts, or calendar spreads. Or in the event where only a selected few participants are invited for the auction process, on a voluntary basis. In the latter case, two-way pricing achieves confidentiality of the auction portfolio and prevents front-running by the participants.

1.40 Two-way pricing does mitigate any potential front running arising from leakage of the information.

1.41 If size of portfolio is not big, it may be quicker to show direction, and request for relevant bids, thus resulting in less inconvenience on part of brokers to take additional time to price both ways.

b. What are the considerations for choosing to use a reserve price in an auction? Are there circumstances where it would be beneficial or circumstances where it might not be appropriate? If so, please describe.

1.42 CCP should not be mandated to set a reserve price in an auction. Rather, a CCP can use an indicative portfolio value which is computed internally as a sanity check against the bids received. The success factor of the auction is not dependent on having a reserve price, which might not be reflective of the market condition.

1.43 Setting a reserve price might have impediment on the CCP in the event where CCP were to get an uneconomical price (might be still within the risk appetite of the CCP) that does not meet the reserve price. In such case, the CCP should retain the flexibility along with appropriate governance structure to decide whether to accept or reject the uneconomical price. Other tools will have to be put in place in the event where the reserve price is not met when all the bids are in, as such re-run the auction process, or activate other default management tools such as partial tear up, which would be disruptive to participants.

Question 12: The discussion paper highlights two factors that affect the amount of time auction participants may need to evaluate a portfolio and submit bids. Are there other factors that are important to consider? Is there a minimum time period that a CCP should consider providing to auction participants?

1.44 Auction participants will be notified through a directive. The auction portfolio, along with an auction information sheet will be circulated within an hour from the issuance of the directive. Thereafter, the participants are required to submit their bids within up to X hours (set out ex-ante) from the time of receipt of the auction information.

1.45 For CCPs where the underlying cash markets situated in Asia, auctions are likely to be conducted during Asian trading hours as the underlying cash markets referenced in the derivatives contracts to be auctioned are situated in the Asian time zones. This is so as such contracts would be most liquid during Asian trading hours, price discovery is at its most robust, and market participants can effectively hedge risks in the underlying cash markets.

1.46 The CCP and its participants ought to also test the adequacy of the time period through fire drills. Such timeline could be revised after execution of fire-drill exercises with the participants. It is envisaged that the timeline could be shortened when participants are familiarised with the process.

Question 13: If a clearing member contributes a "significant" part of the default fund, should that clearing member automatically be included in the auction process? What reasons are there for not including the clearing member?

1.47 Auction participation should be based on whether that CM has any exposure in the contracts that constitute the portfolio at the time of the default, instead of being based on a CM's proportion of contribution to the default fund. This is so as a CM which has a "significant" contribution to the default fund may not be active in the contract and hence, may not have the capability from both risk and operational perspectives to process the auction portfolio. In addition, the CM may not have the expertise to properly price the portfolio, which may in turn skew the auction result.

1.48 There is no reason for the automatic inclusion of a CM solely because of its significant contribution to the default fund. Based on the principle of loss mutualisation, that CM would already bear a relatively larger proportion of the default loss vis-à-vis the other CMs. That alone does not necessitate a CM's mandatory participation in a default auction, which is part of the default management process. Issues arise: for example, how would a CCP determine the proportion of contribution for which inclusion is automatic? That would generally be an arbitrary figure. Moreover, this could have the perverse incentive for a CM to clear less products with the CCP to ensure its contribution falls below the "significant" mark.

1.49 It is only fair that every participant who has an exposure in the contract(s) that constitute the auction portfolio at the time of the default, should be required to participate in the auction process. This is primarily so as Clearing Members who are active in the contract would have the capability from both risk and operational perspectives to process the auction portfolio. This provides clarity to every member of its obligation to participate in the default management procedures in relation to the products it clears. Moreover, these Clearing Members have skin-in-the-game to participate in the auction process. Such Clearing Members will be incentivise to provide good bids, as their Clearing Fund contributions will be subject to juniorisation based on their bidding behaviour and the outcome of the auction. For some CCPs, the auction is limited and mandatory for such CMs.

1.50 A part of the member's clearing fund contribution will be apportioned, representing the relative risk of the member's exposure to the contracts. It is not the member's entire clearing fund contribution at risk. This allows for equitable loss distribution which will incentivise proper bidding behaviour. Members with greater exposures will be incentivise to participate appropriately. On the other hand, members with smaller exposures does not get unduly penalised, since they contribute lower levels of risk to the clearing system.

Question 14: The discussion paper discusses the trade-off between flexibility and predictability. How do you assess these trade-offs? Can you elaborate on the ways you provide for predictability while still maintaining flexibility (eg establishing rules and conditions to govern the determination of auction parameters)?

1.51 Default management is a critical process for the CCP and the main objective is to get back to a matched book, and minimise losses to the other participants (other members and CCP).

1.52 Rules are binding on the clearing members. It sets out the general obligations and rights for both the CCP and the clearing members in relation to an auction. Guidance on the details of the default management procedures such as templates, auction format, information sheet, non-disclosure agreement, are covered within the default management handbook and not codified in the rules. The default management handbook is provided to the participants.

1.53 To ensure the best outcome of the auction, the CCP would need flexibility to act accordingly to any potential stressed market conditions. As part of the default management process, the CCP will provide regular update to its regulator. It would be useful where the supervisor provides sufficient backing to its CCP in the event where there are variances to the default management procedures. Such flexibility when backed by its regulator, will be more palatable to the market participants.

1.54 It is prudent that a CCP retains the right to use auction to expeditiously restore a matched book, and have the flexibility to exercise the most suitable recovery tools at the appropriate juncture.

Question 15: If a CCP uses juniorisation as an incentive to encourage competitive bidding, and in a scenario where the CCP has invited only a subset of participants to an auction, how will the CCP apply the juniorisation to the clearing participants who were not invited?

1.55 For some of the CCPs, auction is mandatory for all members who have open positions in the contract(s) that constitute the auction portfolio at the time of the event of default. Clearing fund resources of such clearing members will be apportioned for the auction. When the apportioned clearing fund resources for the auction are fully exhausted, then the remaining clearing fund resources (i.e. which will include the clearing fund contributions from clearing participants who were not involved) to offset the default losses.

1.56 Juniorisation operates on two levels:

a) a portion of the clearing fund contributions of participants will be used ahead of other Clearing Members who are not required to participate;

b) among the participants, non-bidders' contributions are applied ahead of bidders, while the highest bidder(s)' contributions will be applied last.

Operational considerations (Chapter 5)

Question 16: CCPs may distribute information that would help auction participants estimate the potential impact of a successful auction bid on their margin requirements. Besides those that members and clients would having during BAU, what information (and at what level of detail) or tools would be most useful for calculating these estimations and why?

1.57 For each auction portfolio, the auction participants will receive an auction information sheet which will specify the breakdown of auction portfolio, auction details, including but not limited to, margin requirements, auction timeline, auction format, bid format. The auction portfolio will be provided to auction participants in csv format, which could be loaded into their back office system for the participants to estimate the potential impact on their books.

Question 17: The sharing of confidential information (ie the defaulted participant's portfolio) carries potential risks, as discussed in the paper. What are the potential risks associated with information leakages, how does the CCP balance such risks with other objectives (eg sharing sufficient information for a successful auction), and what are the measures the CCP uses to address such risks?

1.58 The major risks associated with information leakages is that the risks of potential front-running of the market, price manipulation, both of which may lead to increased market volatility.

1.59 CCPs can take measures to control the information dissemination only to its intended limited audience, such as encrypting auction-related information before dissemination to auction participants.

1.60 Where the CCP may invite indirect participants (i.e. clients of CMs required to participate in the auction) to bid in the auction, such participants should be required to enter into a non-disclosure agreement with the CM prior to the sharing of confidential information with them. Under the non-disclosure agreement, among other conditions, the clients who do not provide the winning bids are required to immediately delete and destroy confidential information relating to the auction after scheduled time of conclusion of the auction. The non-disclosure agreement provides an avenue for the CCP to seek legal recourse against errant clients, in event of a breach in confidentiality that negatively impacted the outcome of an auction.

Question 18: CCPs use various modes of information transmission during a default management auction (eg email, web-based portal). Can you elaborate on which modes

are the most effective in which circumstances and whether it varies depending on the type of information, and why? Would you consider web-based portals a best practice? If so, why?

1.61 The mode of transmission should be at the discretion of the CCP, so long as the means is secured. This could be achieved through either encrypted email transmission, web-based portal with credential validations or secured file transfer gateway.

Question 19: What are the challenges and trade-offs of creating a realistic default management testing exercise? What processes are used to create the scenarios used in such exercises?

1.62 A default of a global financial institution could have widespread impact on the clearing ecosystem given the high level of interdependencies between CCPs and banks for the provision of different services (clearing, settlement, custody, investment). For realistic default management exercises, much resources would be required to simulate default of institutions that provides more than one service in the ecosystem (e.g. default of a Clearing Member whose affiliate is a Settlement Bank).

Question 20: There may be benefits in pursuing greater standardisation and harmonisation across CCPs in relation to certain operational elements which support execution of an auction.

a. **For example, should auction portfolio files be in a standard (or partially standardised) format (for different product types)? If so, which aspects of the portfolio file would benefit the most from cross-CCP standardisation (eg file type, layout, order of information, or content)?**

1.63 Auction portfolio files could be in a largely-standardised format for CMs, as this would minimise confusion and error by CMs during the pricing/bidding process, especially in the event of a multi-CCP default requiring CMs to participate in multiple auctions across various CCPs in the same timeframe. Already, the attempt to standardise the language used for default auctions with the Uniform CCP Terminology for Default Management Auctions is a helpful first step in the right direction.

b. **Besides CCP portfolio files, which other operational elements would benefit (the most) from greater standardisation and harmonisation across CCPs?**

1.64 Other operational elements could include template of submission of auction bids by the clearing participants.

c. **Are there specific operational elements or areas where standardisation and harmonisation may not be helpful?**

1.65 The auction format (i.e. single unit pay your price, or modified Dutch) should not be standardised, as it is based on what is most appropriate in the context of the CCP's operating environment and membership.

Client participation (Chapter 6)

Question 21: For which markets, asset or product classes and client types would client participation be most feasible and/or desirable? What would be the incentives for clients to participate in auctions? Does this differ for direct vs indirect client participation? Please elaborate in your response.

1.66 Client participation would be most desirable for CMs which only do client clearing and do not have any House positions in the contracts constituting the auction portfolio. Direct/ indirect client participation is generally based on the clearing model.

1.67 One benefit of client participation is that it could potentially help reduce the need to resort to partial tear-up which may be disruptive, and therefore incentivise these clients to provide competitive bids towards achieving a successful auction.

1.68 Client participation should be indirect instead of direct as its clearing member has the prerogative to decide whether to invite the client to submit a bid, what information should be disclosed to the client for the purpose of pricing the auction portfolio, and whether the client's bid should represent the clearing member's bid in the auction. Accordingly, the onus is also on the clearing member to ensure that there is proper behaviour of the client that participate in the bidding process. Ultimately, clearing member will have to guarantee the performance of the client if it is winning bid.

Question 22: The discussion paper describes some ways to address the risks borne by a clearing member arising from its clients bidding in an auction. Are there additional ways to address the risks? Are there incentives that a CCP could employ to encourage client participation in an auction (eg ways to encourage clearing members to facilitate their clients' participation)?

a. **One option for addressing a disparity in incentives between clearing members and clients is to require clients to contribute an established amount to the default fund prior to participating in an auction. What are the implications of this requirement (such as regulatory, economic or contractual implications) and how can a CCP address these implications?**

1.69 It is not feasible to require clients to contribute an amount to the default fund prior to participating in an auction, as it could disincentivise their participation if these amounts are significant. It may be unfair for the clients if such contributions are utilised to meet any default losses arising from the auction. Moreover, these clients do not enjoy clearing membership benefits.

1.70 In the case of clearing members that conduct only agency business, a requirement for clients to contribute will further hamper the ability of such clearing members to fulfil their obligation to participate in the auction. This may in turn exacerbate liquidity strain in the financial markets during times of crisis.

Default of a common participant across multiple CCPs (Chapter 7)

Question 23: The discussion paper suggests that the conduct of multi-CCP default management exercises may provide useful insights into the hedging and auction procedures, should these be conducted by multiple CCPs concurrently. Can you elaborate on what specific insights could be obtained in relation to hedging and auctions via these multi-CCP default management exercises, if possible with concrete examples?

1.71 This could only be applicable in the event where the default scenario covers a default of a global financial institution. It should be noted that the range of products cleared by the CCPs, and availability of market liquidity during the different time-zones are vastly different. Likewise, hedging and auction procedures also differs. There exist no or little benefits in getting insights into hedging and auction procedures via multi-CCP default management exercises.

Question 24: Feedback from the industry suggests that introducing a cap on the number of traders that can be seconded to multiple CCPs from a particular common clearing participant at any one time may mitigate the potential burden on clearing participants' participation in DMGs. How could such caps be instituted and implemented in practice? What could be the challenges of introducing such caps? Apart from caps, are there other options a CCP could consider to mitigate this potential burden?

1.72 The key role of a trader being seconded to the CCP is to provide advice on the hedging or auction tools undertaken by the CCP. Such arrangement should not be required for every asset classes. CCP should have the discretion powers to decide on the need of engaging traders and such arrangement should be established ex-ante.

1.73 In the event where caps are instituted, the designated traders will be required to be present in every fire-drill exercises which the CCP conduct, as well as within stipulated timeline by the CCP. Clearing Members should be responsible in the event that the designated trader fails to perform the agreed arrangement.

Question 25: Are there efficiencies or benefits to be gained from CCPs coordinating their respective default management auctions or hedging arrangements? If so, how?

a. **Are there any arrangements that could be coordinated ex ante (eg cross CCP netting arrangements)? How could these arrangements be established? What would be the challenges with these arrangements? How could these challenges be mitigated?**

1.74 Refer to responses to question 23.

General

Question 26: Are there any additional points of consideration that would contribute to a successful auction that are not mentioned in this discussion paper? If so, what are they?

Question 27: What are the potential areas in the context of default management auctions where guidance might be most welcome?

IV Conclusion

We are appreciative of the opportunity to provide our responses to the consultation document. If you require any further information or clarification, please do not hesitate to contact the following persons:

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