

Chella ActiveRisk™

A complete risk platform for Exchanges and Clearing Corporations

Overview


Chella Software Private Limited engages with CCPs and exchanges in solving their domain and technology problems. Over the past two decades we have helped our customers transform their operations, manage their risks in an efficient manner, help them launch new products and set up new markets. We facilitate rapid Go to Market with a high level of reliability. We have delivered this at very compelling price points. We continue to be part of many global and regional firsts in this domain.


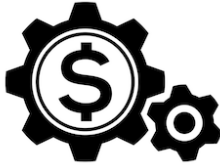
Chella ActiveRisk™ our risk management platform is used by leading exchanges and CCPs across the world. We were instrumental in enabling the world's first OTC derivative platform to go live with real time risk management for Interest Rate Swaps and FX Forwards. This was for Clearing Corporation of India Ltd, a qualified CCP and a founding member of CCP12, that provides trading, counterparty guarantee and clearing services across G-Secs, Tripartite Repos, FX Forwards, FX Spot and IRS. The system which is developed and deployed successfully is in operation for more than a decade. It is one of the most advanced and sophisticated risk management systems in the CCP world even today. In addition to real-time risk management Chella ActiveRisk™ provides various modules to achieve PFMI compliance and a range of analytics and reports.

Key clients for Chella's risk management offerings

<p>DCCC Dubai Commodities Clearing Corporation</p> <p>DGCX Dubai Gold & Commodities Exchange</p>	<p>Dubai Commodity Clearing Corporation is the leading CCP in the MENA region. It clears trades executed on the Dubai Gold and Commodities Exchange, the largest derivatives exchange in the region. DCCC uses Chella ActiveRisk™ platform for stress testing, back testing, margin computation, hypothetical capital and computation of the default fund.</p>
<p>The Clearing Corporation of India Ltd.</p>	<p>The Clearing Corporation of India is a pioneer in the CCP space, as it setup one of the first CCPs in the world for OTC trades. It provides guaranteed settlement on various interbank OTC trades. CCIL uses four platforms developed, implemented and maintained by Chella Software.</p> <ul style="list-style-type: none"> - Risk management system for FX Forward trades done in the OTC interbank market - Risk management system for Interest Rate Derivative trades done in the OTC interbank market - An integrated stress testing platform that covers all products cleared by CCIL - A FX trading platform which is used by over 75 banks and 2000 corporates across the country, to buy and sell FX using a centrally matched, order based anonymous electronic trading platform.
<p>Indian Clearing Corporation Limited</p> <p>ICCL</p> <p>Reliability builds relationships</p>	<p>India Clearing Corporation Limited is the CCP setup by BSE Ltd., the oldest stock exchange in Asia. ICCL uses Chella ActiveRisk™ risk management platform to compute real time portfolio margins for, equity and index derivative contracts traded on various exchanges in India.</p>
<p>NSE nairobi securities exchange</p> <p>Discover Opportunity</p>	<p>Chella Software worked as a consultant for NSE to help them setup and launch NEXT, the 2nd derivatives exchange in Africa. Chella Software's team of consultants helped NSE finalize their standard operating procedures, their risk policies, trading and clearing system specifications and the member rules. The team provided full quality assurance for the processes, procedures and systems.</p>

Modules and features of Chella ActiveRisk™

<p>Stress test is to simulate open position against forward-looking (hypothetical) scenarios or historical scenario thereby evaluating the notional MTM losses generated through stress simulation against the CCP's default fund. This stress test evaluates the robustness of the CCP.</p> <p>As per EMIR Section 6 Article 57 states: "A CCP shall conduct reverse stress tests which are designed to identify under which market conditions the combination of its margin, default fund and other financial resources may provide insufficient coverage of credit exposures and for which its liquid financial resources may be insufficient"</p> <p>A reverse stress test will identify scenarios where the CCP's notional MTM based on a specific scenario shall use all available CCP resources including Margin, Default fund and other financial resources such as overdraft.</p>	 <p>Stress testing and reverse stress testing</p>
<p>Real time portfolio margining</p> 	<p>The online risk management engine computes portfolio based margins both on a pre-trade and post-trade basis for a wide range of financial products and derivatives. It can be used for both exchange traded and OTC products. It supports the SPAN® portfolio margining method provided by CME and also provided proprietary VaR based portfolio margining methods.</p> <p>It is a high speed system with very low latency. It is used by large CCPs for realtime portfolio margining for complex asset classes</p>
<p>Chella ActiveRisk™ provides for generation of initial margins and collateral hair cut using the VaR methodology. It is a parameterized system that allows for selecting the time period as the input for the computation of VaR. Historical VaR, Hybrid VaR and Monte Carlo VaR are supported by the system.</p> <p>The following are computed</p> <ol style="list-style-type: none"> 1. Initial margin 2. Collateral haircut 3. Inter commodity spread credit 4. Intra commodity spread charge 	 <p>Initial Margin computation</p>
 <p>Back testing module</p>	<p>Chella ActiveRisk™ provides CCPs the ability to backtest the margins and haircut percentages and determine if they are adequate to cover MTM losses over the liquidation period. Backtesting is broadly divided in 4 categories viz;</p> <ol style="list-style-type: none"> i) Margins ii) Collateral haircut iii) Inter-commodity spread credits iv) Intra-commodity spread charge

<p>The default fund module computes the risk weighted contribution of each clearing member to the default fund. It is a module that is generally customized to suit the by laws and requirements of each CCP</p>	 <p>Default fund module</p>
<p>Hypothetical capital module</p> 	<p>Hypothetical calculation is compulsory declaration to be made by CCP on a regular basis. In order to be a Qualifying CCP it is necessary to calculate the hypothetical capital of the CCP (along with the C Factor) and make this information available to clearing members. This must be done on a regular basis. Chella ActiveRisk™ computes and provides this number.</p>

Team behind our offerings

Chella Software is led by an able team comprising of industry experts and technocrats. The key members of the team are

- *Mr. Kathir Kamanathan* – Founding member and the CEO with over 30 years in Treasury, Capital Markets and Risk technologies
- *Mr. Siddharth Roy* – Senior strategic advisor. Past chair of CCP-12. Over 3 decades of experience in bank treasuries, setting up of CCPs and consulting to central banks, global CCPs and Trade Repositories.
- *Mr. Nilakanta Venkatesh* – Advisor for central bank related offerings. Ex World Bank and the architect of the PAT program for central banks.
- *Mr. Shriram* – Head of Sales, with over 30 years of experience in managing Treasury, Capital Markets, Banking and Market Data segments.
- *Mr. Subbu Rajagopal* – Head of Customer Relationships, with over 20 years of experience in building systems for treasury, trading, risk management and investment management
- *Mr. Peri Lakshmanan* – Head of Engineering and Delivery with over 20 years of experience in delivering solutions for Treasury, Capital Markets and Risk.