Scenario Modeling in the EPM Cloud – Forecasting beyond a crisis
NEED FOR SHORT-TERM AGILITY

Agility can be described as the ability of a business to be adaptive, flexible and creative in responding to a changing environment.

The COVID-19 pandemic and the subsequent measures taken by governments across the globe to contain its spread, along with a calamitous drop in oil prices, have introduced extreme uncertainty and disruptions within a few short months and made agility extremely critical in the short run forecasting process.

Uncertainty is more typically associated with long term plans and forecasts. The longer the timeframe, the greater the risks and therefore, the need to plan for uncertainty in forecasts and plans.

On the demand side, sudden spikes in unemployment and sharp drops in purchasing power combined with lockdown measures have resulted in steep declines in consumer spending across several industries. Overall, consumer spending has shifted to very different patterns compared to pre-pandemic levels: spending on necessities such as groceries and household supplies has increased; discretionary spending on luxury items has become a much lower priority; online shopping has become the preferred way to shop; all travel has ground to a halt; spending on at-home entertainment has grown rapidly during lockdowns.

On the supply side, disruptions have become the norm in the near term; many businesses that cut costs through offshore manufacturing and sourcing are now looking to mitigate disruption risks by diversifying their supply channels. Trade barriers and controls imposed by governments due to risk aversion have impacted supply and transportation networks and significantly increased lead times. Perishables are being destroyed due to these disruptions, resulting in artificial shortages and price hikes.

From a day to day operations standpoint, businesses are finding new ways to operate through lockdown periods: non-essential businesses around the globe stay closed for prolonged periods; manufacturing lines across many industries have been stopped indefinitely; these closures and stoppages have had extreme impacts on liquidity and cash flow; remote work has become the norm for many roles within organizations; IT departments are scrambling to address dramatically different needs and challenges compared to just a few weeks ago.

FORECASTING IN THE AGE OF UNCERTAINTY

These volatile circumstances have forced businesses to think differently on ways to retool and manage their operations. COVID-19 has altered the dynamics and made uncertainty management an integral element of the short run planning and forecasting process. Planning based on a specific set of assumptions and targets needs to give way to planning for a variety of possible scenarios and outcomes, making scenario modeling a core requirement.

Approaches based on historical trend analysis, seasonality and year-over-year comparisons are no longer viable in planning and forecasting. Finance leaders are turning to scenario modeling and rolling forecasts as more effective tools to deal with unforeseen levels of short-term uncertainty.

Conversations with CFOs indicate they are preparing for a range of scenarios rather than depend on individual time-horizon-based models. Some are developing base, best, and worst-case scenarios, while others are juggling many more scenarios that incorporate specific assumptions related to economic recovery, government policy and market demand factors. The overall objective is to stay agile and develop alternative strategies to deal with a variety of ways in which the post-crisis world might evolve.

Some businesses may take a defensive cost-cutting strategy and look to ride out the storm by making headcount reductions, exiting certain markets, and divesting non-performing assets and even businesses. Other organizations may take a more opportunistic view and decide on a growth strategy through mergers and acquisitions, radical business model transformations or investing in new opportunities.

Several organizations are evaluating such strategic decisions; others are in survival mode spending their energies on tactical liquidity management and cash flow planning. Doing well in either pursuit requires capturing and modeling a range of possibilities. You need to create scenarios that consider revenue, cost and liquidity drivers, such as changes in customer
demand, supply chain disruptions, government actions, volatility in commodity prices, and a host of other factors that are relevant to your industry and your specific business.

In times of uncertainty, you need a financial planning solution that can effectively perform scenario modeling functions to capture a range of possible outcomes that will help ensure agility, business continuity and growth.

For example, a well-known retailer has been modeling a variety of scenarios related to shifts in its sales channels and customer behavior:

- Phased store reopening, dates, regions and locations
- Online versus store sales mix changes
- Consumer spend shifts from luxury goods to staples
- Cost structure changes due to supply disruptions

Being prepared with specific responses to these possible outcomes will substantially improve business agility and enable your organization to manage through the crisis with minimal adverse impact. The strategic scenario modeling solution within Oracle's EPM Cloud is ideally suited for such contingency and business continuity planning efforts.

The concept of a model within Strategic Modeling is so flexible it can represent a singular financial unit for which you want to forecast your financial statements. It could represent a legal entity, a business unit, a region, a product family, a cost center, or even a specific project. A model is where most of the range-based scenario forecasting happens.

A model that has completed its scenario-based forecast can contribute to the overall business scenario through a blending feature (called 'Consolidation Structure') that allows each model to contribute its own scenario that best represents its outcome to the overall decision making process at the corporate level. Models can roll up in hierarchal structure into other parent roll-up models based on the family they belong to.

For example, North America, South America, Asia and EMEA could be structured as regional models with country specific models within them, and these regional models rolling up to the worldwide consolidated model. Each country model will be contributing its own scenario to the consolidation structure. Within each model a business planner can create as many on the fly scenarios as needed to capture a range of financial outcomes at each level.

Let’s review the unlimited flexibility available here using a simple COVID-19 use case example: Quick Recovery, Moderate Recovery and Long Recovery can be three scenarios created for a business unit or region. Of course, within a region marked as Moderate, specific countries or states could be set up for Quick or Long recovery. The Moderate Recovery scenario can inherit its non-impacted account values from Full Recovery, except for specific driver accounts that may need to be modified for the Moderate Recovery use case.

Risk analysis and the ability to forecast the level of confidence in the underlying forecast methods is a valuable capability during these times. Companies can use this information to assess the risks and plan mitigation actions. Some businesses may need to go beyond the Base/Worst/Best case models; support for running Monte Carlo simulations within each model provides the financial planner the ability to run hundreds of simulations on each model and understand the level of confidence in a business goal or target being achieved.

Monte Carlo simulation screen demonstrating the probability of achieving scenarios
In addition, using the flexible account and custom dimension structure within strategic modeling, businesses can model for changes in demand across industries or for forecasting supply disruptions and capacity mix changes.

**MANAGING OPERATIONAL LIQUIDITY**

As more and more businesses project sharp declines in revenues and profits this year, maintaining adequate liquidity to sustain operations each month becomes a critical imperative for organizations of all sizes -- from the largest global conglomerates to small and medium enterprises.

Businesses are focused on generating cash where possible, preserving working capital and stabilizing critical operational activity. As organizations see credit lines and short-term credit being choked at their banks and financial institutions, they are dealing with circumstances that are seldom experienced in short term forecasting. In blunt terms, they are in a fight of their lives to ensure operational liquidity.

Over the coming months, businesses will be required to quickly and repeatedly forecast their cash flows to avoid an operational cash crunch. For the survival and near-term stabilization of the business, they are freezing non-essential spending, resorting to payment deferrals and reimagining their balance sheet, taking every possible step to ensure short-term liquidity and operational continuity. Effective cash flow and balance sheet forecasting are fundamental.

Unlike typical trend and driver-based expense and revenue forecasts, cash flow and balance sheet modeling become critical when you are modeling for liquidity. Strategic Modeling in EPM Cloud is uniquely positioned to support these planning efforts.

As the ripple effects of this pandemic impact every industry and geography, finance teams need the ability to model a variety of scenarios that impact liquidity and explore options to conserve cash: scenarios where customers are delaying payments; exploring alternative lines of credit or non-traditional funding options such as divestitures; drastic decisions to conserve cash such as laying off workers, forgoing rent payments, cutting major planned projects and other strategic initiatives; seeking relief on debt covenants as early as possible to strengthen the balance sheet – every option is now on the table. That is exactly what strategic modeling in Oracle EPM Cloud allows you to do -- explore every option in detail and fully understand the costs and liquidity impact before committing to specific courses of action.

A major retail property investment trust has modeled different scenarios for liquidity, and some of the drivers are a consequence of their retail customers looking to conserve cash:

- Exploring different lines of credit
- Effects of cutting capital project spending
- Impact of tenants defaulting on rent payments
- Divestiture of select properties
- Reductions and deferrals in dividend payments

The timing of this crisis has severely impacted a tax preparation business since 70% of their income is usually generated in the first calendar quarter. They have used strategic modeling to re-forecast:

- Impact of cashflow and earnings change
- Cost of drawing down their credit revolver
- Raising money through debt issuances
- Impact of maturing bonds

When the health of your balance sheet is critical to not just near term survival, but also your ability to thrive once the new normal appears, you want to model different liquidity scenarios with simplicity, speed, and accuracy.
Scenario modeling capability within EPM Cloud uniquely enables you to make the key decisions you need in these times with its easy to use, purpose-built capabilities. The funding option allows companies to decide how to fund cash deficit and how to use cash surplus. It allows a planner to explore a combination of capital and debt structures in their balance sheet for each scenario to model for the best liquidity outcome. The debt scheduler functionality allows companies to model for their debt instruments.

![Screen depicting the ability to model funding and debt options](image)

**INTEGRATED REPORTING AND ANALYTICS**

Strategic Modeling comes with a comprehensive set of pre-built financial statement reports on income statement, balance sheet and cash flow. By using the out of the box financial statements structure and building it out to the company-specific chart of accounts structure, financial analysts and planners can get instant feedback on the impact of changes they make to each scenario. These financial statements in the solution are automatically balanced by the system.

![Dashboard comparing scenarios](image)

Advanced reporting and interactive dashboards within EPM Cloud can be seamlessly leveraged with the scenario modeling capabilities, enabling effective communication of not just the numbers in the model but also the thinking behind the numbers. Built-in capabilities facilitate real-time analysis and report distribution using a variety of report formats. Both reporting and analysis are possible using web browser and familiar SmartView for Microsoft Office interfaces.
BUSINESS CONTINUITY WITH CLOUD

Digital connectivity is now fundamental to the continuity of business operations, as remote work becomes the norm across organizations of every size and in every industry. In today's rapidly changing environment, the ability of finance teams to use cloud-based scenario modeling software is fundamental in enabling them to monitor and navigate the crisis effectively. As a true SaaS solution, EPM Cloud is available to any business user, anywhere in the world, at any time, ensuring seamless collaboration and business continuity.

“There would have been no way that the team could have worked from home without the speed and performance of Cloud

FP&A Executive, Fortune 500 Company using Oracle EPM Cloud

SUMMARY

Scenario modeling in Oracle EPM Cloud empowers finance organizations and enables them to make proactive decisions and maintain liquidity in a time of extreme short-term uncertainty. By leveraging the solution to manage through the crisis and beyond, businesses can ensure resilience and agility in their operations, staying several steps ahead of their competition.
Scenario Modeling in the EPM Cloud – Forecasting beyond a crisis

May 2020
Oracle EPM Product Management and Product Marketing