

What Can Business Process Management (BPM) Do for You?

These Processes...and More!

The following is a list of BPM processes our construction clients are using every day.

Construction Processes:

- Variance Purchase Order/Change Order Process – BPM manages all aspects of a vendor's or builder's Variance Purchase Order (VPO) or contractors Change Order process. BPM can even automatically regulate VPOs in excess of budget amounts and can do so by linking any wireless mobile device or laptop. What's more the "round-trip" of data can automatically update BuilderMT WMS, Timberline Accounting and other back office systems!
- Contractor Bid Process – Automates the bid solicitation process for contractors and contractor to/from their trades/subs or suppliers, while automatically referring to the bill of materials, right to the level of unit price or lump sum items. Since BPM can work with any browser or e-mail system, a sub or supplier can receive item information from the contractor automatically and, in turn, tender a bid in a format that contractors can immediately compare across subs, suppliers, or sectors (e.g. look at all framing package bids, side-by-side, or compare plumber's labor estimates). The BPM process can even issue a contract to the sub or supplier.
- Sub Invoice Approval Process – Allows a builder or contractor to automatically approve a sub or supplier's purchase orders or invoices **from the field** using any mobile device or laptop, while updating BuilderMT WMS, Timberline Accounting or your back office system!
- RFI Process – Subcontractor submits a Request for Information. Project Engineer responds directly or forwards to Architect, who can respond directly or forward to Consultants. After all Consultants have responded, Architect reviews their responses and forwards to Project Engineer, who can reject or forward response to questioner and pre-configured contacts per job of his choosing. Ability to add and view attachments at any point during the process. Final response is in .pdf format as an email attachment.

Database stores attachments, workflow, questions, answers, etc for historical viewing via a browser. Users can switch between mobile and desktop/laptop versions throughout the process.

- Builder Update – Lists jobs assigned by the builder per job/community and point-of-construction, as well as by the information used with other processes *and* in for calculating builder bonuses.
- Job Dates – Display key dates and job information on one screen.
- Schedule Complete – This process, run from the field, sends schedule information to builders, management and vendors. The process can be automated.
- Lot/Job List – Electronic list of all lots in each community, and it lists release dates, take-down amounts, and lot-specific requirements.
- Vendor Schedule Notification – On a weekly basis, sends email/fax to vendors with their upcoming schedule. Based on WMS Scheduling. BPM notifies the construction manager if a customer has not been contacted in an appropriate amount of time in order to make arrangements to do the “Pre Drywall” or “Close” on the property. If this scheduling task is not addressed by the Const manager within 24 hrs it escalates.
- Scheduling Updates - BPM notifies const manager if ANY open schedules have not been updated in the last 36 hrs – if nothing is done it escalates.
- Back dating a Scheduling Activity - BPM notifies if a super “Backdates” a purchasing activity in the schedule....this causes scheduling problems on the portal and cash flow problems for homebuilders because they reported last week on what would be needed this week based on the completed activities in scheduling last Friday.
- Notifications to accounting and purchasing - once all the scheduling activities are completed...instructing them to verify all Pos are paid and if any PO's or VPO's are open to close them....this keeps Accounts Payable clean and the job can be closed....we don't wait for all the bills to come in on the 10th.
- Sales Pricing Spreadsheets – To experiment with pricing, commissions, etc. User selects Division, Area (subdivision), and model, which adds Base, Community and Elevation option costs to an online ‘spreadsheet’ (grid). Each elevation constitutes 1 row. User can add as many models as they wish. User inputs percentages for Commission, Override, Coop, Coop Bonus, Points and Closing, Gross Margin, and

amounts for Concession, New Lot Price (vs. Original Lot Price), and refreshes the spreadsheet. The spreadsheet calculates House Budget, Community Budget, Hard Cost Total, Soft Cost Percent, Total Hard Cost, Standard Price, and Price Per SqFt. With the user entered Sale Price per elevation, it calculates Market Adjustment, Adjusted Price Per SqFt, Adjusted Gross Margin. User can save the 'Spreadsheet', return to it at a later date, and continue adjusting the numbers. Also exports to Excel.

- Move Dates from Homefront to WMS Scheduling - Transfers newly entered dates from Homefront Sales into WMS Scheduling and Re-Calculates the Schedule. This happens every 5 minutes.
- Blackberry Field PO's - Site Supervisors can enter Field PO's on their Blackberry's that send pricing requests to Vendors and final approval from Purchasing. PO's are issued and auto imported into Timberline Job Cost
- Waste Bin Ordering - Site Supervisors use their Blackberry's to order Waste Bins for each job. The process checks to see if there are budgeted bins available for that job based on Non-Issued PO's in WMS Purchasing. If there are no PO's available an Field PO is created. The order is fed directly into the Suppliers Ordering database using a URL BPM component. Eliminating phone calls and emails.
- Vendor Report Cards - We issue annual 'Report Cards' to let our Trade Partners know how they did over the last year. This can be a large project encompassing multiple departments and dozens of trade partners. A BPM process was created so our staff could 'grade' our Trade Partners online via Web Forms instead of the old paper process
- Vendor Notifications - Used by staff to notify trade partners of Job Releases, Change Orders and other job related information via web forms. It uses Issued and Non-Issued PO's to tell the user which Trade Partners are assigned to that job so the correct partner is notified. All notifications are logged.
- Schedule Lookup - Allows staff to lookup a schedule from WMS Scheduling in a web form without having to use WMS.
- Lot Inspections - Blackberry forms are used to inspect the condition of lots purchased from a developer. Any damage and incomplete work is noted and stored for backup in case back charges come at a later date for damages (i.e. cracked sidewalks) from the developer.

- Safety Hazard Assessment Blackberry Forms - Hazard Assessment forms are filled in on the Site Supervisors Blackberry's and converted into MS Word documents and sent to our Safety Manager
- Service & Warranty Purchase Orders - Converts Warranty Work Orders that are chargeable into pricing requests sent to the Vendor. Vendor submitted pricing is then approved by our Purchasing department. Also covers back charges to other trades for damages or incomplete work. Back charges are auto imported into Timberline AP as Invoices.
- Schedule notifications - are triggered by a BPM event configuration in WMS, send e-mails to staff based on the completion of certain schedule activities. There are a few parties that get notified when a new start sheet is approved, and purchasing is notified at a few points in the schedule which triggers the next phase of purchase order release.

Financial and Accounting Processes:

- Builder Reserve – Allows Builders to review open purchase orders at end of job, to add known additional costs, and to posts comments for Timberline Accounting.
- Accounting Review – Works with Builder Reserve to automate posting “accrual” at end of job.
- Construction Loans – Lists bank loan amount per job. Timberline Accounting updates as draws are taken.
- Customer Closing – Displays job, customer, and closing information. Use it to track scheduled and actual closings per job. It also generates “Closing Letters” for the customers.
- Generate Deposits files for import into Timberline – User selects a job and enters Deposit Date, Deposit Amount and Description, and ‘adds’ to a grid. After deposit info is finished for multiple jobs, BPM generates comma delimited files to import into Timberline via Timberline import functionality. Deposits are recorded in a database for

historical viewing. Application includes configuration for Canadian GST tax and rebate rules, GL Codes, Debit and Credit Account numbers per adjustment types, etc.

- Generate Sales Closing files for import into Timberline – User selects a job and enters Accounting Date, Base House Revenue, Extra Revenue, Non-rebateable Revenue, and multiple Adjustment Types, Adjustment Amounts, Adjustment Notes, then ‘Adds’ to the Import Files. BPM gets the Deposit amount from Timberline, and with the user entered info, calculates GST, GST Rebate, and Total Due at Closing. When the user has finished adding multiple jobs, BPM generates comma delimited files to import into Timberline via Timberline import functionality. Application includes configuration for Canadian GST tax and rebate rules, GL Codes, Debit and Credit Account numbers per adjustment types, etc.
- Bank Balance Notifications - I get notified if my cash balance in any of my 21 bank accounts ever goes below \$1000.
- Reopening Closed Jobs – This process tells me when someone has re-opened a closed job. Our supers get a bonus based on the final job cost vs. the original estimate, so when a job gets re-opened, someone is trying to post to a job that could possibly have already received the bonus. Once accounting closes a job – it is rare that it should ever need to be reopened.
- Operating Expense Purchase Request - Used by the Management team to make purchase requests for approval from the Executive team. Each Manager is assigned to a GL Account (Sage Timberline Custom Fields). The Manager’s Windows ID is put into the GL. When the process runs it compares the currently logged in Windows ID to the GL to build a GL Account list for coding. Approved requests are converted into PO’s and imported into Timberline JC.

Customer/Client Processes:

- Customer Call Log – Displays job and customer information; there is an input screen to electronically track all communications with customers.

- Customer Service Requests – In conjunction with Customer Call Log, user tags call as a Warranty issue. Adds multiple warranty items, and generates Customer Service Request in .pdf format that the customer signs as being in agreement.
- Customer Survey – Prints customer survey that can be used at closing; it also electronically tracks and calculates customer responses to survey questions.
- QI Data – Electronically tracks and calculates QI inspection data on a per-job basis.
- QI Defaults – User-maintained thresholds for QI Data.
- Seasonal Maintenance Letters – Four times a year, generates seasonal maintenance letters per customer (for a one year period after closing) and mailing labels. Deposits them in a specified folder on the network and advises employee that the letters and labels are ready to print.
- Customer Possession Survey – Each day, BPM sends an email to customers who have taken possession x days previously. Customer clicks on link in email to take the online survey in their preferred language. If customer does not respond within x days, a reminder is sent to them. If they still don't respond within another x days, BPM groups non-responders together and notifies a company employee, who, via a browser interface, can either resend survey(s) or terminate survey(s). The application is configured to handle multiple surveys in multiple languages.
- Customer Letters – User creates a letter (template) in Microsoft Word, entering pre-configured tags for Customer Name, Address, Job Number, Sale Date, Cancel Date, Closing Date, Scheduled Closing Date, Sale Price, Sales Agent, etc. After uploading the new template and selecting query parameters, BPM generates all the letters in one .pdf file that the user can print. User can re-use, modify or delete existing templates, as well as view previously generated letters.
- Home Closing Coordination - BPM notifies and sends emails automatically (6 weeks prior to projected completion) to the customer, closing coordinator, banker and closing attorney – letting them all know that the home will be ready to close on such and so day – and to please start making arrangements for the same.
- Notifies Closing Coordinator - two weeks prior to closing date – telling her to personally call and arrange exact dates and times for all the parties involved so closing always happens on time.

- Customer Portal - Web Portal for our Customers allows them to...
 - View outstanding work on their home that wasn't complete due to seasonal weather. It will inform them of projected completion dates
 - View Outstanding Warranty Work Orders and their projected completion date
 - Submit Warranty Requests online that feeds directly into our Service & Warranty Management system
- Scheduling Triggers for Customer Communication - At certain stages of construction staff are encouraged to enter customer specific notes to keep the communication lines open between different departments on each job. This process uses the Scheduling Activity Completed process to notify staff via email

Employee or Human Resources Processes:

- Employee List – Lists employees and contact information; it also electronically updates these lists from the Payroll application; you can also use it for security setup in BPM Portal.
- Sales Payroll – This process captures all sales and cancellations, as it calculates Sales Commissions.
- Sales Payroll Configuration – This interface configured (a) commission types, benefits (medical, dental, flex, etc), pay dates; (b) max loan per pay, max loan per employee, auto-loan, offset per quarter, max advance per job, commission percentages or amounts, 2-tier standard bonus (% or \$), 2-tier crown bonus (% or \$), benefits (% or \$) per employee; (c) division bonuses, subdivision bonuses, job bonuses.
- Employee Admin Form - This is used for a New Hire to get the process in Payroll, IT and HR approved and setup before new employee first day. This is used for making ANY changes to an existing employee from moves to title changes to monetary changes. This is used for when an employee leaves the company for any reason.
- Exit Review for Managers - This is used for Managers to complete and submit to VP of HR when an employee leaves the company for future reference in their file.

- Absence Report - This is used company wide when employee is out of the office for any various reason(s). This is approved by their manager and sent to Payroll and HR for tracking purposes.

Miscellaneous Operational Processes:

- Recipient information – User-maintained list of BPM processes and e-mail recipients for each process.
- Lunch – Process emails select users and ask them to place their lunch order at local restaurants.
- Audit Logging – Logs any additions/changes to data via BPM processes. Captures logged in user, model, action, date, job, division, field name, and field value.
- WMS Events – Captures in real time WMS milestone and activity actual end dates and spawns processes: (a) updates corresponding and other fields in Timberline; (b) generates Customer Start Letters (depending on activity). Fully dynamic – configurable via BPM_WMS_Timberline_Mapping table.
- Builder1440 data changes – Every five minutes it polls 1440 for additions/changes to Sale Date, Ratification Date, Cancel Date, Permit #, Sales reps 1,2,3, Referral reps 1,2, Design Center rep and spawns processes: (a) updates Timberline; (b) generates Customer Buyer Approval Letter (depending on 1440 field)
- Expiring Insurance – On a daily basis, sends email/fax to vendors advising them of their insurance expiry 14, 7, and 0 days before expiration. Integrates with Timberline data or your accounting system.
- Reports via email – On a weekly basis, generates multiple reports and emails them to groups/individuals. Recipients configured by Recipient information.
- Data Anomalies – Each night it checks for the following data anomalies/inconsistencies and notifies preconfigured employee via email. Has mitigated a lot of GIGO issues, and subsequent erroneous reporting: (a) Builder1440 – duped reps per configuration; (b) duped Builder1440 sales without a cancel; (c) Builder1440 reps with no login or email (needed for Sales Payroll process); (d) Builder1440 reps with no match in central Employee database; (e) terminated employees with active login credentials in BMT

Portal and Ensemble; (f) sales reps with no assigned sales manager (needed for Sales Payroll process)

- Synchronize WMS vendors to match MasterBuilder vendors – BPM compares WMS vendors with MasterBuilder vendors, and inserts, updates and inactivates accordingly.
- Synchronize WMS vendors, jobs and purchase orders to match Explorer Software Accounting – BPM compares WMS vendors, jobs, purchase orders, budgets, etc. with the Explorer Construction Accounting and Job Cost System, and inserts, updates and inactivates accordingly. This could be done with other back office enterprise construction accounting systems as well.
- IT Support Request - Staff submit support tickets and are tracked internally.