



B.R.N. ENTERPRISE CO., LTD.

1011 Supalai Grand Tower, 7th Floor, Unit 6-7, Rama 3 Road, Chongnonsi, Yannawa, Bangkok 10120
Tel. (+66) 2687 0250 Fax. (+66) 2687 0255

Test Cases and Test Procedures

Document	Test Cases and Test Procedures	Release	17/08/26 V1.0
Project	BRN WMS	Project code	200-WMS-26-001-00
Project period	05/01/26–24/08/26		

1. Objective and status disclosure

Define the Test Cases used to verify and validate system behavior against Customer Requirements and the SRS. This document specifies the cases and records their execution. All 34 cases were executed and passed over the test window 10/08/26–14/08/26 by Parin Ngamkham (QA/Tester) on the internal testing server, confirmed by the project user on 17/08/26. Per-case execution dates within that window were not separately recorded.

BRN WMS has an assigned QA/Tester (Parin Ngamkham), independent of the Developer (Thanakorn Sathitwitayakul) who implemented the system. Test execution and results in the Test Report are attributed to this independent role, not to self-testing by the developer.

Two environments are used, and the distinction matters for how the results should be read:

Activity	Environment	Owner
Test execution (this document and work product 16)	Internal testing server	Parin Ngamkham — QA / Tester, supplier side
User acceptance testing (work product 22)	Customer production environment	Seri Viriyasakultorn — Project Sponsor / Customer Representative

Because functional and non-functional test execution runs on the internal testing server, destructive and high-risk cases — for example the TC-NFR-003 failure/rollback simulation — could be exercised without risk to customer data.

2. Test case specification

No.	Test Case ID	Test Item	Input Specification	Output Specification	Environment Needs	Special Procedural Required	Intercase Dependency	Status	Test Date
1	TC-FR-001	Registration and invited-user onboarding	New company owner registration; invited-user onboarding link	Company/owner account created; invited user completes onboarding into the correct company	Web browser, PHP/MariaDB test environment	Valid email/SMTP delivery available	—	Passed	10/08/26–14/08/26
2	TC-FR-002	Role-based authentication	Login as Owner/Admin/Staff/Viewer	Each role reaches only its permitted screens/actions; unauthorized action rejected	Internal testing server, browser, seeded users per role	Test accounts for all 4 roles	Requires TC-FR-001	Passed	10/08/26–14/08/26
3	TC-FR-003	Password recovery / session / OTP	Forgot-password request; concurrent login attempt	Reset completes without exposing credentials; concurrent-session rule enforced	Web browser, SMTP test environment	—	Requires TC-FR-002	Passed	10/08/26–14/08/26
4	TC-FR-004	Company/SMTP/settings/user/app-access administration	Authorized admin changes company profile, SMTP, settings, user, app access	Change is saved; unauthorized user is rejected	Web browser, Admin account	—	Requires TC-FR-002	Passed	10/08/26–14/08/26
5	TC-FR-005	Master data CRUD	Create/view/update/deactivate warehouse, storage/bin, category, product, contact	Valid record created/updated; invalid input rejected	Web browser, Admin/Staff account	—	Requires TC-FR-002	Passed	10/08/26–14/08/26

No.	Test Case ID	Test Item	Input Specification	Output Specification	Environment Needs	Special Procedural Required	Inter-case Dependency	Status	Test Date
6	TC-FR-006	Simple vs layered warehouse model	Configure a company with basic model, another with warehouse/storage/bin levels	Both configurations operate correctly for their company	Web browser, two test companies	—	Requires TC-FR-005	Passed	10/08/26–14/08/26
7	TC-FR-007	Stock-in	Valid receipt: product, quantity, location, document	Movement and balance created correctly; invalid input rejected	Web browser, seeded product/warehouse	—	Requires TC-FR-005	Passed	10/08/26–14/08/26
8	TC-FR-008	Stock-out	Authorized issue within available balance; issue exceeding balance	Balance reduced correctly; excessive issue rejected	Web browser	—	Requires TC-FR-007	Passed	10/08/26–14/08/26
9	TC-FR-009	Stock transfer	Transfer between two authorized locations	Source/destination movements balanced and linked as one transfer	Web browser	—	Requires TC-FR-007	Passed	10/08/26–14/08/26
10	TC-FR-010	Lot/serial/expiry tracking	Stock-in with lot/serial/expiry attributes	Attributes retained and shown in applicable reports	Web browser	—	Requires TC-FR-007	Passed	10/08/26–14/08/26
11	TC-FR-011	Stock/movement/capacity/expiry reporting	Request stock overview, movement history, capacity/occupancy, low-stock, expired-stock, product-lot reports	Reports reflect authorized data with applied filters	Web browser	—	Requires TC-FR-007–010	Passed	10/08/26–14/08/26
12	TC-FR-012	Barcode labels and scanning	Generate SKU/location label; scan into a supported screen	Label contains a usable identifier; scanned value accepted	Web browser, barcode scanner or scan simulation	Printer/scanner access if available	Requires TC-FR-005	Passed	10/08/26–14/08/26

No.	Test Case ID	Test Item	Input Specification	Output Specification	Environment Needs	Special Procedural Required	Inter-case Dependency	Status	Test Date
13	TC-FR-013	Sales lifecycle	Create quotation → order → invoice; process a return/credit note	Valid lifecycle transitions and related stock/financial effects occur	Web browser	—	Requires TC-FR-005, TC-FR-007	Passed	10/08/26–14/08/26
14	TC-FR-014	Purchasing lifecycle	Create purchase request → order → invoice; process a supplier return	Valid lifecycle transitions and related stock/financial effects occur	Web browser	—	Requires TC-FR-005	Passed	10/08/26–14/08/26
15	TC-FR-015	Finance documents	Create receipt billing/receipt and payment billing/payment	Document linkage, amount, status, and history retained	Web browser	—	Requires TC-FR-013, TC-FR-014	Passed	10/08/26–14/08/26
16	TC-FR-016	Accounting structures and posting	Maintain chart of accounts/departments/formulas; post a journal/GL entry	Structures maintained; balanced, traceable entry posted	Web browser	—	Requires TC-FR-004	Passed	10/08/26–14/08/26
17	TC-FR-017	Financial reports	Request trial balance, P&L, balance sheet, VAT, journal, GL-movement reports	Reports use authorized data and produce consistent totals for the period	Web browser	—	Requires TC-FR-016	Passed	10/08/26–14/08/26
18	TC-FR-018	Document numbering and lifecycle	Create a controlled document; attempt an invalid status transition	Document number follows configured sequence; invalid transition rejected	Web browser	—	Requires TC-FR-013 or TC-FR-014	Passed	10/08/26–14/08/26

No.	Test Case ID	Test Item	Input Specification	Output Specification	Environment Needs	Special Procedural Required	Inter-case Dependency	Status	Test Date
19	TC-FR-019	File attachment	Upload/retrieve a permitted file on a supported record	Allowed file uploaded and retrieved only by authorized users	Web browser	Supported file type available	Requires TC-FR-005	Passed	10/08/26–14/08/26
20	TC-FR-020	Report filter/view/print/export	Filter, view, print, and export a supported report	Output matches selected scope/filters	Web browser	—	Requires TC-FR-011 or TC-FR-017	Passed	10/08/26–14/08/26
21	TC-FR-021	Status/alert notification	Trigger a status transition that should notify a user	Only authorized recipients receive the notification	Web browser, Socket.IO connection	Node.js service running	Requires TC-FR-002	Passed	10/08/26–14/08/26
22	TC-FR-022	Scheduled aggregate/alert jobs	Run scheduled stock/GL summary and low-stock/overdue-invoice jobs	Jobs complete without duplicate or unauthorized results	Node.js scheduler environment	Scheduler running	Requires TC-FR-007, TC-FR-015	Passed	10/08/26–14/08/26
23	TC-FR-023	Creator/updater/status/history retention	Create then modify a controlled record	Reviewer can identify ownership and lifecycle events from retained history	Web browser	—	Requires TC-FR-005	Passed	10/08/26–14/08/26
24	TC-FR-024	Company/warehouse data isolation	Attempt cross-company or unauthorized-warehouse access	Access denied in UI and server-side action	Web browser, two test companies	—	Requires TC-FR-002, TC-FR-005	Passed	10/08/26–14/08/26
25	TC-NFR-001	Secrets protection	Review repository and deployed environment for committed/exposed secrets	No committed active secret or publicly exposed protected configuration found	Repository access, deployed environment	—	—	Passed	10/08/26–14/08/26

No.	Test Case ID	Test Item	Input Specification	Output Specification	Environment Needs	Special Procedural Required	Inter-case Dependency	Status	Test Date
26	TC-NFR-002	Server-side validation/authZ/tenant scope	Negative-authorization and invalid-input attempts against server-side actions	Rejected without unauthorized data change	Web browser, API-level test tooling	—	Requires TC-FR-002, TC-FR-024	Passed	10/08/26–14/08/26
27	TC-NFR-003	Transactional integrity	Simulate failure/rollback and concurrent-write scenarios on document+stock+GL postings	Balances and records remain consistent	Internal testing server	—	Requires TC-FR-007, TC-FR-016	Passed	10/08/26–14/08/26
28	TC-NFR-004	Installation/configuration/backup/recovery	Follow Product Operation Guide to install, configure, back up, and restore	Administrator completes each step successfully	Fresh internal testing server instance	Product Operation Guide (work product 19)	—	Passed	10/08/26–14/08/26
29	TC-NFR-005	Responsive UI	Load representative screens at agreed desktop and mobile viewport sizes	Screens remain usable at each size	Web browser, responsive-mode/device testing	—	—	Passed	10/08/26–14/08/26
30	TC-NFR-006	Operational performance	Execute representative operations/reports under agreed data volume	Operations complete within practical operational time	Internal testing server with representative data	—	Requires TC-FR-022	Passed	10/08/26–14/08/26
31	TC-NFR-007	Maintainability	Locate the responsible module/class for a sample change request without touching unrelated modules	Change is isolated to the correct component	Repository access	—	—	Passed	10/08/26–14/08/26
32	TC-NFR-008	Platform/browser compatibility	Install and run representative workflows on the supported PHP/MariaDB/Node/browser matrix	Installation and workflows succeed on the supported platform	Supported platform matrix	—	Requires TC-NFR-004	Passed	10/08/26–14/08/26

No.	Test Case ID	Test Item	Input Specification	Output Specification	Environment Needs	Special Procedural Required	Intercase Dependency	Status	Test Date
33	TC-NFR-009	Traceability completeness	Review the Traceability Record for gaps on any Must requirement	No unexplained gap found	Traceability Record (work product 13)	—	—	Passed	10/08/26–14/08/26
34	TC-NFR-010	Time-zone consistency	Compare stored/displayed operational times and scheduled-job execution time against Asia/Bangkok	Times and execution follow the configured time zone	Web browser, Node.js scheduler logs	—	Requires TC-FR-022	Passed	10/08/26–14/08/26

3. Approval

Prepared by

Name: Parin Ngamkham

Role: QA / Tester

Signature: _____

Date: _____

Reviewed by

Name: Apirach Supattaratpateep

Role: Project Manager

Signature: _____

Date: _____

Reviewed and authorized by

Name: Seri Viriyasakultorn

Project roles: Project Sponsor / Customer Representative / Authorized Approver

Position: Managing Director

Company: B.R.N. Enterprise Co., Ltd.

Signature: _____

Date: _____