

BOMB JACK

FREE PLAY + HIGH SCORE SAVE KIT

ORIGINAL TEHKAN ARCADE HARDWARE

REVISION 1.0 / STANDARD + WI-FI EDITIONS



STANDARD + WI-FI EDITIONS

PCB identification • Z80 installation • Pin 1 and clearance • ROM Saver • Settings • Support

OVERVIEW AND PREPARATION

Before you begin

ONE INSTALLATION - TWO KIT VERSIONS

The Standard and Wi-Fi kits use the same documented Z80 daughter-card installation. Wi-Fi account and network setup are completed later, after the game starts correctly.

SAFETY FIRST

Turn off and unplug the cabinet. Protect boards and chips against electrostatic discharge. Do not work on the CRT monitor or high-voltage assemblies.

PREPARATION CHECKLIST

- Confirm the original Bomb Jack PCB and gameplay are working correctly before installing the kit.
- Photograph and label every connector before disconnecting a cable or removing the game PCB.
- Use a clean, well-lit static-safe workspace and protect the exposed solder side of the board.
- Find the original socketed 40-pin Z80. Photograph the notch and Pin 1 direction.
- Check the physical area around the Z80 socket for components or test points that could contact the kit.

WHAT'S INCLUDED

1 × HighScoreSaves Z80 daughter card. A compatible Z80 processor is required; use the existing socketed Z80 or a compatible processor option purchased with the kit.

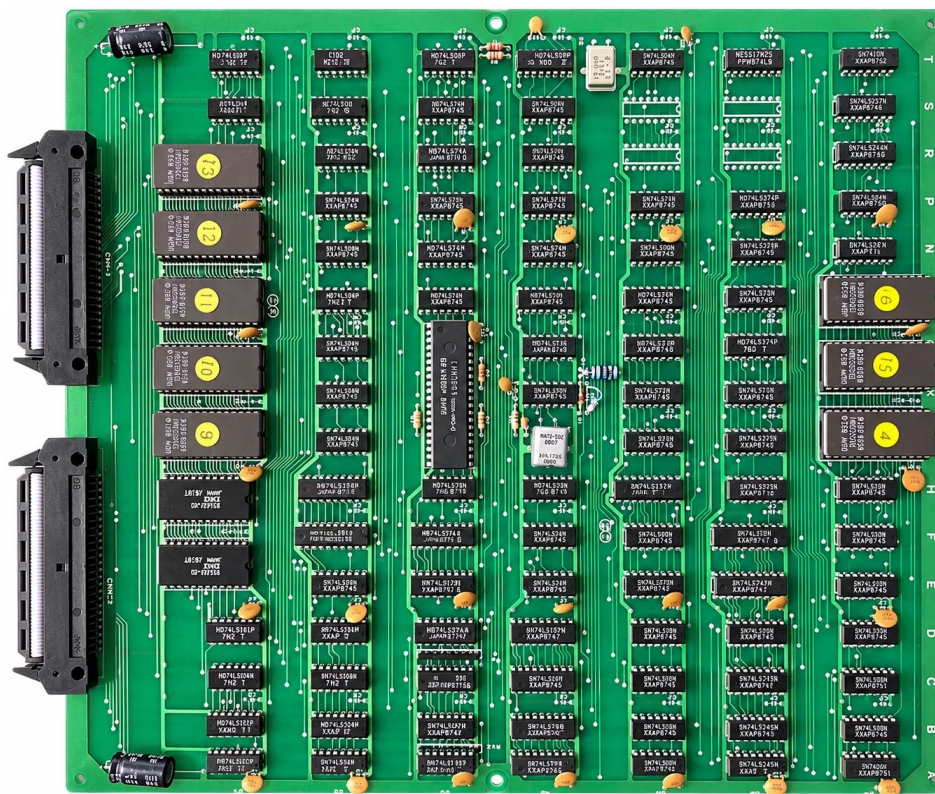
Hardware compatibility: designed for documented compatible original Tehkan Bomb Jack arcade PCBs. Modified boards or other revisions may differ.

STEP 0 / BOARD IDENTIFICATION

Identify the original Bomb Jack PCB

Compare your arcade PCB with the clean board photograph below. This kit is intended for a compatible original Tehkan Bomb Jack board, not an unrelated or look-alike conversion.

ORIGINAL BOMB JACK PCB - BOARD REFERENCE



Complete original Bomb Jack arcade PCB reference, showing component arrangement and edge connectors.

CONFIRM YOUR BOARD BEFORE REMOVING CHIPS

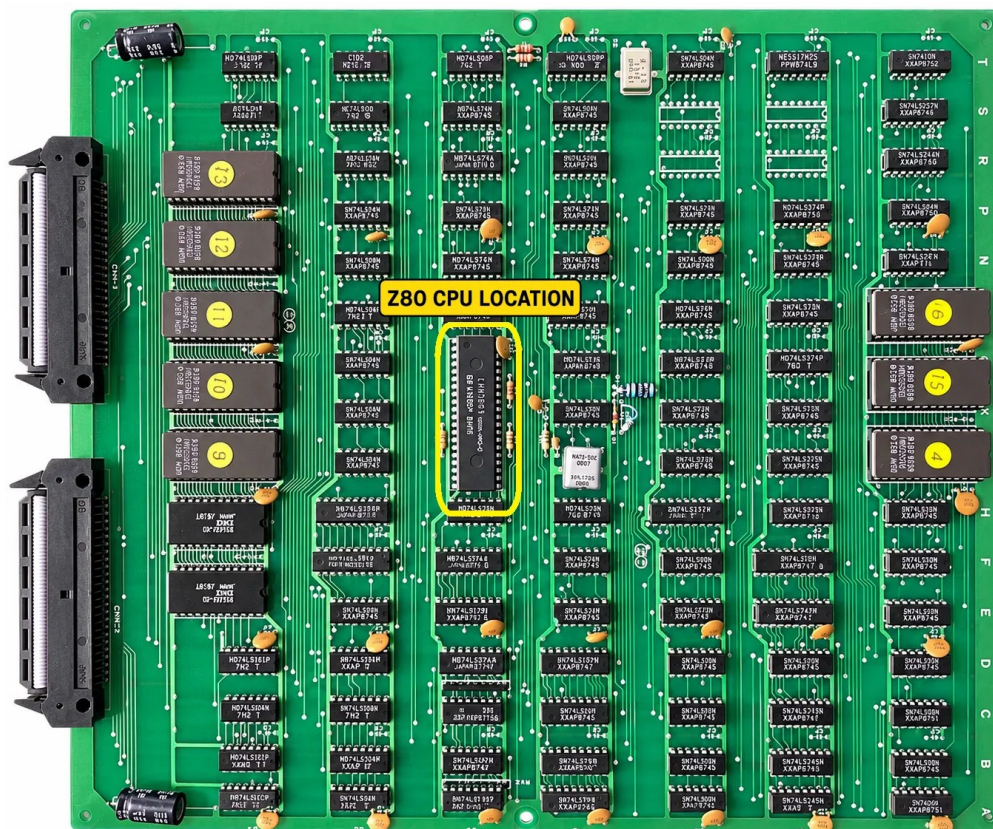
This original guide provides a partial board overview. Check PCB markings, connectors, and component layout. If your board differs, confirm compatibility before proceeding.

STEP 1 / REMOVE THE Z80

Locate and remove the original Z80

With the cabinet unplugged, find the socketed Z80 shown in the marked photograph. Record the chip notch and Pin 1 position before carefully lifting the 40-pin processor.

ORIGINAL Z80 CPU LOCATION



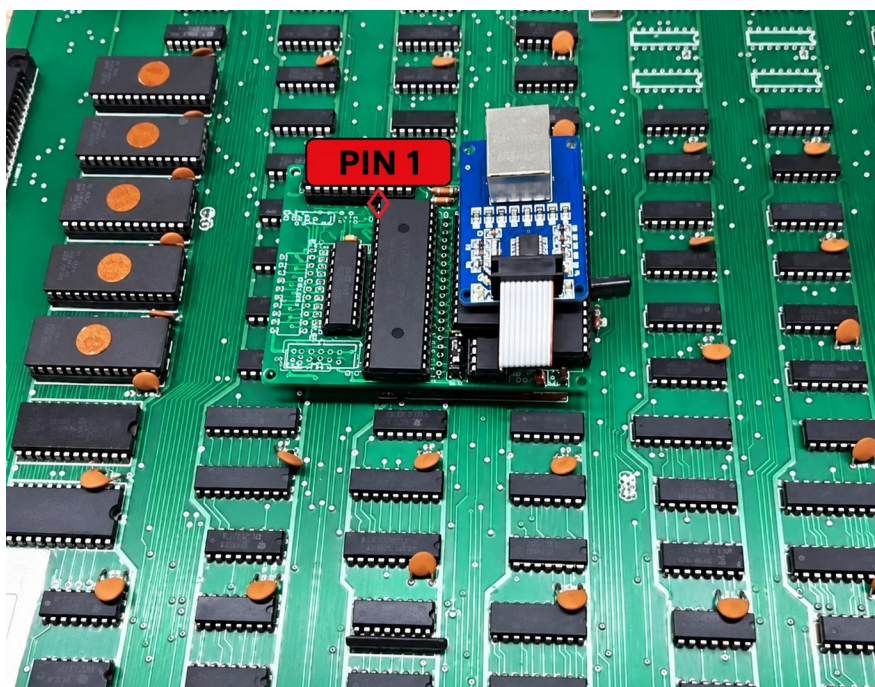
STEP 2 / CPU TRANSFER + ORIENTATION

Fit the Z80 and verify Pin 1

CRITICAL: PIN 1 ORIENTATION

Install the original Z80 into the HighScoreSaves daughter-card CPU socket. Align the Z80 notch and Pin 1 with the markings on the actual daughter card. Do not force the pins.

PIN 1 ORIENTATION REFERENCE



The red pointer identifies Pin 1 on the Z80 in the daughter-card installation photograph.

CHECK THE INSTALLATION SEQUENCE

- Identify Pin 1 on the original 40-pin Z80 and the daughter-card CPU socket.
- Fit the Z80 into the daughter card with all pins straight and fully aligned.
- Recheck the notch direction before placing the combined assembly onto the arcade PCB.

VERIFY BEFORE CONTINUING

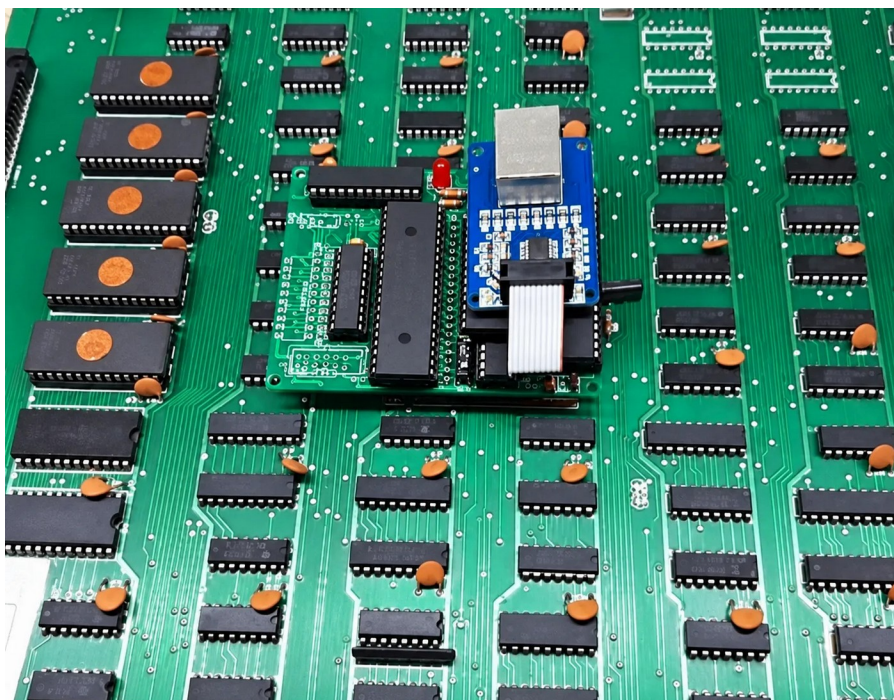
Compare the Pin 1 positions on the original CPU, the daughter-card socket, and the original PCB socket before applying power. Stop if any mark is unclear.

STEP 3 / SEAT AND INSPECT THE KIT

Install and inspect the daughter card

With the Z80 correctly seated in the daughter card, align the kit header with the vacated original 40-pin Z80 socket. Install it straight, checking the socket alignment and surrounding clearance.

DAUGHTER-CARD INSTALLATION REFERENCE



Installed Z80 daughter card with attached module on the original Bomb Jack PCB.

UNDERSIDE CLEARANCE CHECK

Ensure no original PCB test points, component leads, sockets, or metal parts touch the underside of the daughter card. The source guide warns that test points may interfere. Do not power on until sufficient clearance is confirmed.

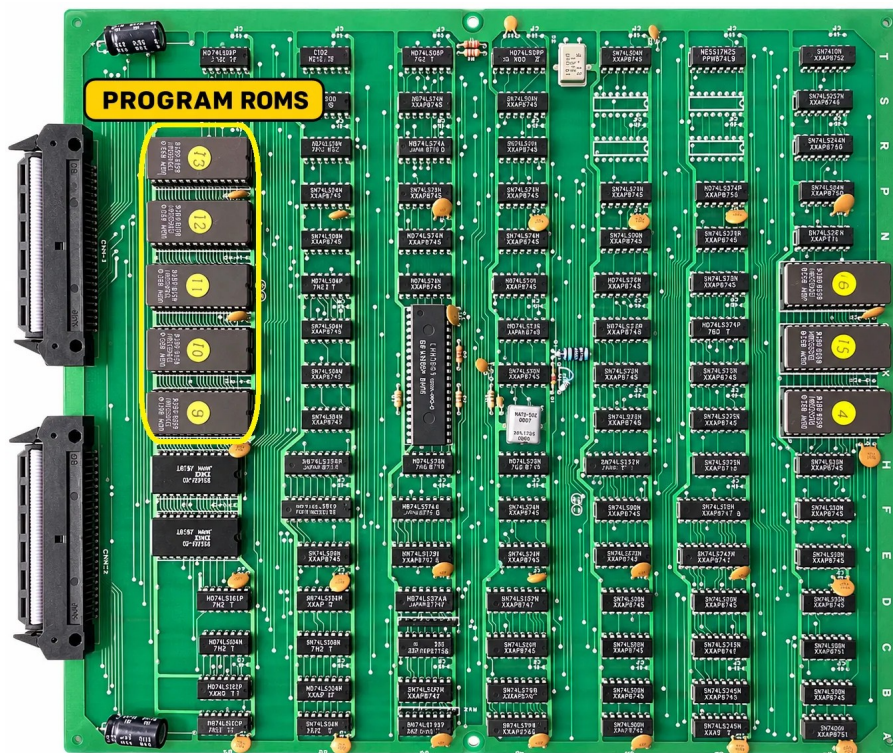
If a test point or component obstructs installation, stop and have the clearance corrected safely. Do not bend unknown components or use force to seat the kit.

STEP 4 / OPTIONAL ROM SAVER

Optional program ROM removal

The source guide identifies a group of original program ROMs that may be removed when using the kit. Removal is optional: install and verify normal game operation with original ROMs in place first.

YELLOW-OUTLINED OPTIONAL ROM BANK



The five designated program ROMs are identified by the yellow outline. Leave them installed unless optional ROM Saver removal is confirmed.

REMOVE ONLY THE IDENTIFIED CHIPS

Optional ROM removal should follow confirmation of the exact supported ROM Saver setup for your original board revision. Label and store any removed ROMs in antistatic packaging. Never remove visually similar ICs elsewhere on the board.

STEP 5 / VERIFY AND TEST

Final installation and first test

BEFORE POWERING ON

- Z80 CPU fitted in the correct Pin 1 orientation inside the daughter-card socket.
- Daughter-card header pins correctly aligned and fully seated in the original Z80 socket.
- Underside clearance checked; no contact with test points or nearby components.
- Original ROMs retained unless optional removal was separately verified.
- All connectors and cables reinstalled as documented in your preparation photographs.

FIRST POWER-ON

Reinstall the board in the cabinet, reconnect every cable, and turn the game on. Confirm a normal start, playable Bomb Jack, coin/free-play behavior as configured, and persistence of a qualifying high score after the cabinet is switched off and on.

HOW TO ENTER THE SETTINGS MENU

With cabinet power off, hold Player 1 Start while powering on. Release the button when prompted on-screen. Depending on the kit configuration, startup menu-entry timing can also be enabled or disabled.

IF THE GAME DOES NOT START

Switch off immediately. Recheck Z80 orientation, daughter-card and socket seating, clearance, original ROM positions, and restored PCB connections. Ask HighScoreSaves for help before retrying if anything is unclear.

Wi-Fi-enabled kit setup

SAME PHYSICAL INSTALLATION

The Wi-Fi kit uses the same Z80 daughter card and socket installation as the Standard Bomb Jack kit. It additionally carries a Wi-Fi module. Do not treat the module as a separate installation step.

AFTER THE ARCADE KIT IS WORKING

- 1 Obtain your PK and SK account keys**
Follow the account setup emails and instructions provided by HighScoreSaves.
- 2 Enter online settings in the kit menu**
Enter the supplied PK and SK keys exactly; enable online scoring and save the settings.
- 3 Connect the module to Wi-Fi**
Use the module's temporary Wi-Fi network and setup page to join a compatible 2.4 GHz network.
- 4 Test an online score**
Submit a qualifying score after Wi-Fi setup, then check your linked online score page.

KEEP YOUR PK / SK KEYS PRIVATE

Wi-Fi configuration is version-specific. Keep your PK and SK private and use the current HighScoreSaves setup instructions for detailed connection steps and troubleshooting.



Open complete Wi-Fi setup instructions

Wi-Fi kit information, network setup, PK/SK keys, and online scoring

LINKS / REFERENCES

Helpful resources and support

These links are clickable in the PDF. For the most current documentation, setup instructions, and kit-specific information, use the live HighScoreSaves pages below.

**Bomb Jack kit product page**

Compatible original Tehkan hardware, options and current ordering

**Bomb Jack PCB compatibility**

Identify the original hardware and pre-order requirements

**Bomb Jack settings-menu video**

Verified HighScoreSaves Bomb Jack settings demonstration

**Bomb Jack original service manual**

Tehkan board setup, test procedures and service reference

**Bomb Jack original schematics**

Tehkan original board circuit drawings and wiring reference

**Wi-Fi setup and Standard comparison**

Official 2.4 GHz setup and Wi-Fi overview

**Installation guide library**

Other HighScoreSaves arcade-kit installation guides

**Contact HighScoreSaves**

Technical support and questions about original PCBs