

01 Insert Screw Not Loosening



PROBABLE CAUSES

- Wrong Torx key size
- Worn or rounded Torx key
- Insert pocket clogged with chips
- Thread-locker residue jammed inside
- Screw head damaged

CORRECTIVE ACTIONS

- Use correct Torx size (T7/T8/T15 depending on tool)
- Replace worn Torx key immediately
- Clean insert pocket using air blow + brush
- Apply mild heat (if thread-locker is used) to soften
- If screw head is damaged, remove with extractor and replace screw

02 Insert Screw Stripping / Rounding



PROBABLE CAUSES

- Excessive tightening torque
- Using incorrect or worn Torx key
- Poor alignment of Torx key when applying force

CORRECTIVE ACTIONS

- Use controlled torque (typically 3-5 Nm for small screws, 5-8 Nm for medium)
- Always insert Torx key fully into screw head
- Replace worn key immediately
- Replace screw after any sign of deformation

03 Insert Not Seating Properly



PROBABLE CAUSES

- Chip contamination under insert
- Damaged seating surface
- Using incorrect insert type/size
- Clamping screw bottoming out before locking

CORRECTIVE ACTIONS

- Clean pocket thoroughly
- Inspect and replace toolholder if seating surface is worn
- Verify insert code matches toolholder specification
- Replace screw if too long/threads damaged

04 Screw Breaking During Tightening



PROBABLE CAUSES

- Overtightening
- Using wrong screw length
- Poor screw material quality
- Cross-threading

CORRECTIVE ACTIONS

- Follow correct torque values
- Use screws supplied by manufacturer
- Start screw by hand to avoid cross-threading
- Replace whole screw set at regular service intervals

05 Insert Moving During Cutting



PROBABLE CAUSES

- Under-tightened screw
- Worn screw head
- Poor insert seating
- Incorrect screw type

CORRECTIVE ACTIONS

- Tighten to correct torque
- Replace screw
- Reclean seating area
- Verify screw type (flat-bottom, conical, etc.)

IMPORTANT: USE THE CORRECT TORX KEY, SCREW SPECIFICATION AND TORQUE.

Verify the exact screw, insert and toolholder combination before applying torque.

06 Torx Key Slipping While Clamping



PROBABLE CAUSES

- Key worn or rounded
- Using L-key instead of flag Torx for tight spaces
- Wrong orientation forcing
- Uneven pressure
- Oil/coolant contamination on screw head

CORRECTIVE ACTIONS

- Replace Torx key
- Use flag-type Torx for better leverage
- Clean screw head before tightening
- Push Torx fully into recess before force application

07 Insert Damaged During Clamping



PROBABLE CAUSES

- Tightening screw too much
- Hitting insert with key tip
- Using incorrect insert geometry
- Pocket wear causing stress

CORRECTIVE ACTIONS

- Reduce torque
- Insert Torx carefully to avoid hitting insert
- Use correct insert geometry only
- Recondition or replace worn pocket

08 Difficult to Tighten Screw



PROBABLE CAUSES

- Screw threads dirty / rusted
- Holder threads damaged
- Coolant dried inside threads
- Screw not matching thread pitch

CORRECTIVE ACTIONS

- Clean threads using tap
- Apply light oil
- Replace screw
- Check thread pitch before installation

09 Insert Tilting or Not Level



PROBABLE CAUSES

- Seating surface uneven
- Chip packing
- Wrong screw angle
- Insert worn on bottom surface

CORRECTIVE ACTIONS

- Clean seating surface
- Replace insert
- Inspect pocket for wear or impact damage
- Ensure screw angle matches pocket design

10 Insert Popping Out During Heavy Cuts



PROBABLE CAUSES

- Screw insufficient torque
- Negative insert used in positive pocket or vice-versa
- Vibration in tool setup
- Damaged insert seat

CORRECTIVE ACTIONS

- Retighten to recommended torque
- Use correct insert geometry
- Improve tool rigidity / reduce overhang
- Inspect and replace damaged seat

IMPORTANT: USE THE CORRECT TORX KEY, SCREW SPECIFICATION AND TORQUE.

Verify the exact screw, insert and toolholder combination before applying torque.