

10.2 SOLUTIONS TO CORRECT DEFORMED AND CRACKED BLOCKS.

10.2.1 CRACKED FACE SHELLS



- a. Check mold to stripper head alignment (section 5).
- b. Check to see if core assembly is bent or twisted due to over tightening.
- c. Check mix (moisture content). An inconsistent moisture content in your mix may result in inconsistent concrete product quality. The use of a computerized moisture control unit in you mixer is recommended to improved product quality and consistency.
- d. Check pallet receiver guides on slide shaft (section 5).
- g. Increase delay time (section 9).
- h. Check shock absorbers.
- I. Check pallet receiver rubbers.
- J. Check admix.
- k. Check amount of material being left in mold after feedbox goes back.
- I. Check vibrator brakes (for a Vibrapac equipped with standard vibration).
- m. Check roller of block moving cam. It should never leave cam, otherwise you will get a jerky moment that might crack the units.

10.2.2 HALF-MOON ON FACE SHELL



- a. Check for loose division plates.
- b. Check pallet receiver rubbers.
- c. Check that pallet is moving on the conveyor.
- d. Check vibrator bearings.
- e. Check pallet receiver rubbers (hardness).
- f. Check mold assembly.
- g. Check amount of admix in concrete.



10.2.3 LAMINATION ON FACE SHELL AND HORIZONTAL CRACKING



- Check vibrator shaft speeds for R.P.M. (they should turn within 2 R.P.M. of each other - adjust with screw.
- b. Check for metal to metal contact during vibration (mold vibrating against machine mold throat).
- c. Check back apron plate alignment to mold (section 5)
- d. Check that Feedbox is not vibrating on mold.
- e. Check vibrator bearings.
- f. Check delay time (decrease or increase). (section 9)
- g. Check mix design.
- h. Check for loose division plates.
- i. Check for lack of proper admix.
- j. Check slide shaft pucks (section 5).
- k. Check vibrator brakes (for a Vibrapac equipped with standard vibration).
- I. Check roller of block moving cam. It should never leave cam, otherwise you will get a jerky moment that might crack the units.

10.2.4 FRONT OF BLOCK NOT FILLED



- a. Check hopper gate setting.
- b. Check feedbox travel forward.
- c. Check agitator.
- d. Check for chunks in feedbox.
- e. Mix may be too wet.
- f. Check feed time. Increase if necessary. (section 8 and 9)



10.2.5 AREA OF FACE SHELL TOO COARSE



- a. Check machine hopper for build up.
- b. Make sure vibrator sheaves are properly aligned.
- c. Check vibrator weights for proper balance (equal length of clamping bolts and equal weight of nuts).
- d. Check for loose mold parts.
- e. Check for material segregation.
- f. Check vibrator shaft speed.

10.2.6 SMOOTH TOP EDGE ON FACE SHELL



- a. Check for division plate wear.
- b. Make sure stripper shoes protrude through bottom of mold at completion of stripping.
- c. Check stripper head alignment. (section 5)
- d. Check for loose stripper shoes.
- e. Check pallet receiver frame for level. (section 5)
- f. Check moisture content of mix.
- g. Check finish times. (sections 8 and 9)
- h. Check feed time. Decrease if necessary. (sections 8 and 9)
- i. Check autofeed mechanism. Lower if necessary.



10.2.7 BOTTOM EDGE CRUSHED





- a. Check spring opening. (section 5)
- b. Check delay time. (section 8 and 9)
- c. Check stripper head alignment. (section 5)
- d. Check pallet receiver rubbers.
- e. Check for build up on bottom of mold.
- f. Check for build up on pallets.
- g. Check for spillage on pallet.
- h. Check rubbers on cutoff bars.
- i. Check the mix (can be too dry).
- j. Check the air compaction setting (too much force).
- k. Make sure pallet is against bottom of mold.

- a. Increase strip delay time. (section 9)
- b. Check spring opening. (section 5)
- c. Check moisture content of concrete.
- d. Check for excess feed. Decrease feed time and lower autofeed if necessary.
- e. Check vibrator brakes.
- f. Check pallet delivery and timing.
- g. Check air compaction setting.

10.2.8 BLOCK CRUSHED DURING STRIPPING



10.2.9 CORE BAR CRACK



- a. Check vibrator brake settings (for Vibrapac equipped with standard vibration).
- b. Check vibrators shaft speeds.
- c. Check for loose cores.
- d. Check vibrator sheave alignment.
- e. Check pallet guides. Rear guides may have a groove worn so pallets stick during stripping operation (this may not apply to V4).
- f. Check feed and finish time (it may need more).
- g. Check for material build-up on core bars or core assemblies.
- h. Check mix (it can be too dry).

10.2.10 CRACKING AT PALLET SIDE



- a. Check for loose core assembly.
- b. Check for bent core assembly.
- c. Check pallet receiver frame for level.
- d. Check pallet receiver rubbers. Pallet may be moving during finish time (it may require pallet snubbers).
- e. Check pallet guides.
- f. Check core bars for material build-up.
- g. Check for thick and thin pallets.
- h. Check vibrator brakes (may be slipping) for Vibrapac equipped with standard vibration.
- i. Check for material between pallet and pallet receiver rubbers.
- j. Pallet receiver and stripper head alignments.



10.2.11 BLOCK HEIGHT NOT CORRECT FRONT TO REAR



- a. Check pallet receiver frame for level (see section 5.4)
- b. Check stripper head frame in relation to pallet receiver frame alignment.
- c. Check stripper head for level.
- d. Check mold for 5/8" dimension off mold throat.
- e. Check for loose stripper shoe or plunger.
- f. Check agitator grid (see section x.x).
- g. Check delay time.

10.2.12 COARSE TEXTURE IN MIDDLE OF BLOCK FACE



- a. Check vibrator shaft speeds.
- b. Check material for coarse aggregate.
- c. Check (generally increase) feed time setting.
- d. Check material, could be too wet.
- e. Check autofeed, make sure it's turned on.
- f. Check for material segregation.
- g. Check vibrator motor rotation.
- H. Material segregation in machine hopper.



10.2.13 BLOCK NOT FILLED PROPERLY



- a. Check agitator grid for build up.
- b. Check agitator grid to make sure it is turned on.
- c. Material too wet and there may be moisture variations.
- d. Check that autofeed is on automatic.
- e. Check hopper gate setting.
- f. Check if there are chunks in feedbox.
- g. Check feed time.

10.2.14 FACE SHELLS SUCKED IN AT COMPLETION OF STRIPPING



- a. Check core vents, may be plugged.
- b. Material too wet, moisture content variation.
- c. Check for worn division plates.
- d. Check for loose core assembly.
- e. Check stripping speed.
- f. Check admix.
- g. Check for frozen aggregate.
- h. Check core valve springs.



10.2.15 COARSENESS ON BOTTOM OF BLOCK LEAVING A BAD EDGE



- a. Check pallet receiver rubbers.
- b. Check if pallet moves during vibration.
- c. Check vibrator weights, may have to change to larger or smaller vibrator weights.
- d. Check mold for loose parts.
- e. Check stripper head alignment.
- f. Check for material segregation.
- g. Check for build up on pallets or mold.
- h. Check for core spillage on pallet.
- i. Check moisture content of mix. It may be to dry.
- j. Check vibrator shaft rotation.
- k. Make sure pallet is against bottom of mold.

10.2.16 HAIRLINE CRACKING AND PULLING AT TOP OF BLOCK ON COMPLETION OF STRIPPING



- a. Check spring opening to assure height pins stay together during strip.
- b. Check to make sure stripper shoe protrudes through bottom of mold at completion of strip.
- c. Check adjustment for stripping.
- d. Check division plates for wear.
- e. Check for loose stripper shoes.
- f. Check moisture content of mix. It may be too wet.
- g. Check vibrator brakes (for a Vibrapac equipped with standard vibration).
- h. Check roller of block moving cam. It should never leave cam, otherwise you will get a jerky moment that might crack the units.



10.2.17 BLOCK WIDER AT TOP THAN AT BOTTOM



Note: There are no visible cracks on the blocks.

- a. Check block handling during movement to curing kilns.
- b. Check block delivery on machine.
- c. Check stripping adjustment.
- d. Check mold assembly for wear.
- e. Check curing cycle (preset & steam conditions).
- f. Check admix.

10.2.18 BLOCK OUT OF SQUARE (NOT 90° ON EACH CORNER)



- a. Check mold assembly for wear.
- b. Check all mold parts for excessive wear.
- c. Check block delivery on machine.
- d. Check curing cycle (preset, steam, etc.).

10.2.19 DIAGONAL CRACK AT REAR OF BLOCK



- a. Pallet setting on block moving bars may be too late.
- b. Check fork lift bumping rack on Besser-Matic.
- c. Check if pallet is setting down evenly on front delivery conveyor.
- d. Check for loose core.
- e. Check of loose plunger.
- f. Check mix design.
- g. Check vibrator weights.
- h. Check vibrator brakes (for a Vibrapac equipped with standard vibration).
- i. Check roller of block moving cam. It should never leave cam, otherwise you will get a jerky moment that might crack the units.

10.2.20 DIAGONAL CRACK AT FRONT OF BLOCK



- a. Check if pallet hit stop on front delivery too hard.
- b. Check fork lift bumping rack on Besser-matic.
- c. Check if pallet is not setting down evenly on front delivery conveyor.
- d. Check for loose core.
- e. Check for loose plunger.
- f. Check mix design.
- g. Check for wrong vibrator weights.
- h. Check vibrator brakes (for a Vibrapac equipped with standard vibration).
- i. Check roller of block moving cam. It should never leave cam, otherwise you will get a jerky moment that might crack the units.



10.1.21 FEATHER-EDGE AT TOP OF UNIT



- a. Check alignment of stripper shoes.
- b. Check for worn plungers and mold parts.
- c. Check Mix design and mixing procedure.
- d. Check stripping adjustment.
- e. Check for mold shifting.
- f. Check for loose mold parts.
- g. Check stripper head alignment.
- h. Check vibration.
- i. Check vibrator motor brake adjustments.
- j. Check admixture in batch.

10.1.22 CRACK IN MORTAR GROOVE



- a. Check vibrator brakes (for a Vibrapac equipped with standard vibration).
- b. Check for loose end liner.
- c. Check for worn end liner.
- d. Pallet snubbers may be necessary.
- e. Check vibrator shaft speeds.
- f. Check for loose mold parts.
- g. Check stripping adjustment.
- h. Check moisture content of mix.
- i. Check mix design.