

Sub.: Standard operating procedure – miscellaneous

Several standard operating procedures have not been recorded and some new procedures are been introduced herein.

1. Customer complaint database:

- a. A database for details of customer complaints date, ATR and QC has been operational for several years. The database has been modified. From hereon CR has been advised to print the customer complaint in PDF format and upload it on the database. Similarly, engineers at site will use the soft copy of the ATR, fill it, print it on PDF and upload on db. QC shall also use soft copy, print in PDF and upload on db. CR, engineers and QC shall also update the complaint date, ATR date and QC date.
- b. Aruna shall continue to print hard copies for MDs file. CR shall also file hard copy & closed complaint set in customers file.
- c. ATR must be sent within 2 weeks. Fine for default Rs. 500/- on project manager. QC must be completed within one week of ATR.

2. Additions & alterations (A&A):

- a. Every phase of each project has been assigned deadlines for collecting A&A from customers. These deadlines must be strictly followed. If the deadline is over then A&A can be taken only after approval of CR.
- b. For new bookings of flats and villas with advanced stage of construction, A&A must be insisted upon by CR and engineers within 30 days of agreement of sale (AOS). AOS date plus 30 days shall be deadline for A&A of such bookings.
- c. A&A sheets along with plans must be signed on every page by engineer and customer. Strike off blank pages / sections. A&A must be signed by customer only. If representative is signing the A&A prior approval from CR is required (for such approvals CR must have authorisation letter from customer).
- d. Once A&A is signed it must be scanned and sent to CR within one working day. Any changes after that can be only made with prior approval in writing from MD.
- e. A&A of electrical points, CP & sanitary, door positions, changes in walls cannot be accepted after completion of plastering. For such changes prior approval of MD is required.
- f. Engineer / CR may collect request letters/emails from customers for additions and alterations that do not meet our guidelines, but they cannot sign the A&A form. For such A&A prior approval in writing of MD must be taken for any deviations in standard procedures.
- g. For major changes in civil work, drawing must be prepared by Naga Laxmi and approved by MD before starting work.

3. False ceiling:

- a. False ceiling work must be completed before floor tiling without exception.
- b. If a customer requests for false ceiling after floor is completed, prior approval in writing from MD is required. Plus customers must be clearly advised that the work may result in damage to the flooring tiles.

c. CR may allow false ceiling works after receipt of 2nd installment (15%).

4. Stages of work:

- a. Stages of each work have been reiterated in the table given below.
- b. Engineers can proceed with work of the next stage only after completing 100% of the work of the previous stage along with QC check. Corrections as per QC report must be made before proceeding to next stage. If ATR is requested by QC, the ATR must be sent before proceeding to next stage of work. ~~There is no QC check at stage I, however, engineers cannot proceed to stage III without completing the stage II works fully. Grills and windows cannot be installed before completing 1st coat of paint and polish.~~
- c. QC inspection of stage III works must be completed before stage IV works i.e, final coat of paint, polish, CP & sanitary fittings.
- d. Possession for wood work can only be given after completing QC inspection for stage III works and making corrections as per QC report.
- e. The revised stage of work for all projects is standardized as under. This shall be followed wherever works are not completed.

Sl. No.	Stage of work	Description of work - villas	Description of work - apartments
1	Plinth	Excavation, PCC, footings, pedestal, plinth beam, fill back and PCC at plinth level. Site leveling around villa.	Excavation, PCC, footings, pedestal, plinth beam, fill back and PCC at plinth level. Site leveling around block.
2	RCC	Columns & slabs. Columns above plinth are labeled as column 1, 2, 3 and so on. Similarly slabs shall be labeled as slab 1, 2 3 and so on. Slab at plinth level shall be designated as slab zero. Column below plinth shall be designated as column zero.	Same as villas. However, RCC work shall include complete RCC works of lift room and OHT.
3	Brick work	Brick work, door frames, window templates, electrical conducting, fixing chicken mesh at beams & columns, chajjas, parapet walls, CRS, compound wall, RCC gate pillars, Portico PCC, wash area PCC, level marking around the building, one layer brick work in setbacks, setback leveling – 6” below setback FFL.	Brick work, door frames, window templates, electrical conducting, fixing chicken mesh at beams & columns, chajjas & parapet walls.
4	Plastering	Plastering, electrical conducting with metal boxes, plumbing/ drainage lines inside villa.	Internal plastering, electrical conducting with metal boxes, plumbing lines inside flat.
5	Stage I	Water proofing, drainage lines, septic tank, OHT, testing of	Water proofing, external drainage lines, internal one coat of luppum,

		plumbing lines, water connection, external primer, internal one coat of luppum, site leveling, external cladding/ texture, false ceiling.	false ceiling.
6	Stage II	One coat of painting, floor tiles, bathroom tiles, portico tiles, pavers in setbacks, leveling of lawn area, wash area tiles , kitchen platform granite and dado for RCC platforms. Staircase granite, doors & beading	One coat of painting, floor tiles, bathroom tiles. Kitchen platform granite and dado for RCC platforms. Doors & beading
7	Stage III	Windows, french windows, grills, electrical wiring, switches, gates, railings. Where modular kitchen is to be provided, it can be installed after completing stage III works. Kitchen granite and dado must be completed along with installation of modular kitchen. Staircase railing, CP jail for nani traps, lawn	Windows, french windows, grills, electrical wiring, switches, railings. Where modular kitchen is to be provided, it can be installed after completing stage III works. Kitchen granite and dado must be completed along with installation of modular kitchen. CP jail for nani traps
8	Stage IV	Final coat of paint, CP & sanitary ware.	Final coat of paint, CP & sanitary ware.

5. QC plans errors:

- a. QC is making plans for checking RCC & civil works. In case of errors in the plans, engineers must bring it to the notice of QC, Nagalaxmi & MD by email within one working day.

6. No plan - no work:

- a. Engineers can only proceed with work after receiving plans approved by MD.
- b. Use photocopies of approved plans. Do not use printout from soft copies.
- c. Fine for default on project manager – Rs. 10,000/- and possible suspension.

7. Filing of plans:

- a. Procedure for filing of plans is given in internal memo no. 917/6 dated 30.4.2012.
- b. Originals must be kept at site office in ring binders. Do not place several plans in a single plastic cover. Use separate covers for each plan.
- c. Photocopies of original plans shall be used for site works. Flat files may be used. Contractors may be given several copies of approved plans.
- d. RCC & working drawings, if required, may be laminated for site use.

8. Curing:

- a. Curing of RCC works is found to be poor across all sites. Therefore, hereafter engineers are required to send a photograph of the slab along with bunds to QC within one working day of casting the slab. Similarly, photographs of columns with gunny bags must be sent to QC within one working day of casting.

- b. QC shall compare the photographs with dates on test cubes. Any delay will result in a fine of Rs. 5,000/- per day on the contractor and Rs. 1,000/- per day on the project manager.
- c. QC shall attach printed photographs (4 photographs per page) to the appropriate QC check report that is being sent to MD. At every QC check during RCC or civil work, QC must check that the water pressure has a head of 15 ft above the highest slab. Further, the distance from source of water cannot exceed 75 ft. Details of default must be given in the remarks column provided in RCC and civil work check report.
- d. Borewell pumps or OHT or submersible pump in lift wells must be connected to a HDPE pipe of about 1 1/4". 3/4" curing pipes must be attached to this main line. Broken pipes must be immediately replaced.

9. Tiling work:

- a. Main door + lock (other external doors on ground floor in villas) must be fitted before starting the tiling work.
- b. In general bathroom tiling must be completed before floor tiling.

10. Terrace doors:

- a. All terrace doors must have a threshold. The door shutter must be painted with enamel within one working day of installation.
- b. In apartments each door shall have a door closure and night latch fixed to it. Door can be openable from the terrace but must require a key to open from the staircase. Purchase has been advised about ordering a suitable night latch.
- c. For apartments & villas door may be opened towards the external side wherever possible.

11. Basement floor RCC:

- a. All basements in apartments must have RCC flooring. Flooring must be above plinth beam.
- b. Use 2 ft x 2 ft shabad / tandoor stone as form work for the RCC slab. Consolidate soil, level with morrum, lay stone with 1/2" gap and fill gap with cement mortar pointing.
- c. Slab must be casted within one week of laying the stone.

12. Billing:

- a. Bills of works completed must be sent within one week of work being completed. Nagalaxmi has been advised to impose a fine of Rs. 500/- per week of delay in sending the bills.
- b. Bills must be sent by Thursday evening for them to be considered for payments on Saturday. Nagalaxmi has been advised to not consider bills received on Friday and Saturday for payments in that week.

13. Site report on RMC, cement blocks & steel:

- 1. Forms for these 3 reports are uploaded on website. Scanned reports of RMC and steel must be sent within one working day. Scanned reports of cement blocks to be sent by end of week. Purchase has been advised to impose a fine of Rs. 500/- per report in case of delay. Original reports must be filed at site office.

14. Gate pass:

- a. Gate pass is being redesigned. It shall be self explanatory. Engineer/admin at site shall be required to fill in the value of material leaving the site.
- b. Gate pass must be sent to HO every week end.
- c. In case of Tor steel enter details in Kgs along with no. of rods.

15. Safety equipment at site:

- a. Suitable fines shall be imposed on contractor and engineer for any default. Details to be finalised in consultation with QC.

16. Requisitions:

- a. In case of change in item or quantity in requisition, they must be cancelled and new requisition issued.
- b. In case of clarifications about item in requisition, it may be send by email and requisition need not be cancelled.
- c. Remarks on requisitions must be prepared at each site meticulously. Soft copy must be emailed to HO. Hard copy with sign of project manager must be filed at site. Default will result in fine of Rs. 500/-

17. Naming of files:

- a. Without proper nomenclature identifying latest or approved softcopies of documents in word, excel, Acad, Jpeg, Pdf, etc., is very difficult. Therefore the following procedure for naming of files shall be strictly followed.
- b. File format - <project code> <description of file> <date of modification> <version> .extension. Example:
 1. BNC swimming pool rules 02-6-16 Ver1.doc
 2. AGH land title details 05-8-16 Ver1.xls
 3. BNC entry arch -2 & details 05-8-16 Ver3.dwg
 4. Circular no. 849(b) – revised guideline for road works 27-1-17.pdf
 5. ORR to get 13 growth clusters, Telengana Today 23-1-17.jpg
 6. QC Report ABW C-402 VISTA HOMES 30-1-17.zip
- c. Every time a file is modified, change the file date and version no. In case a file is changed several times on the same day the date will remain the same but version no. should be changed as ver 3a, ver 3b, ver 3c