SK EDUCATIONAL PRODUCT

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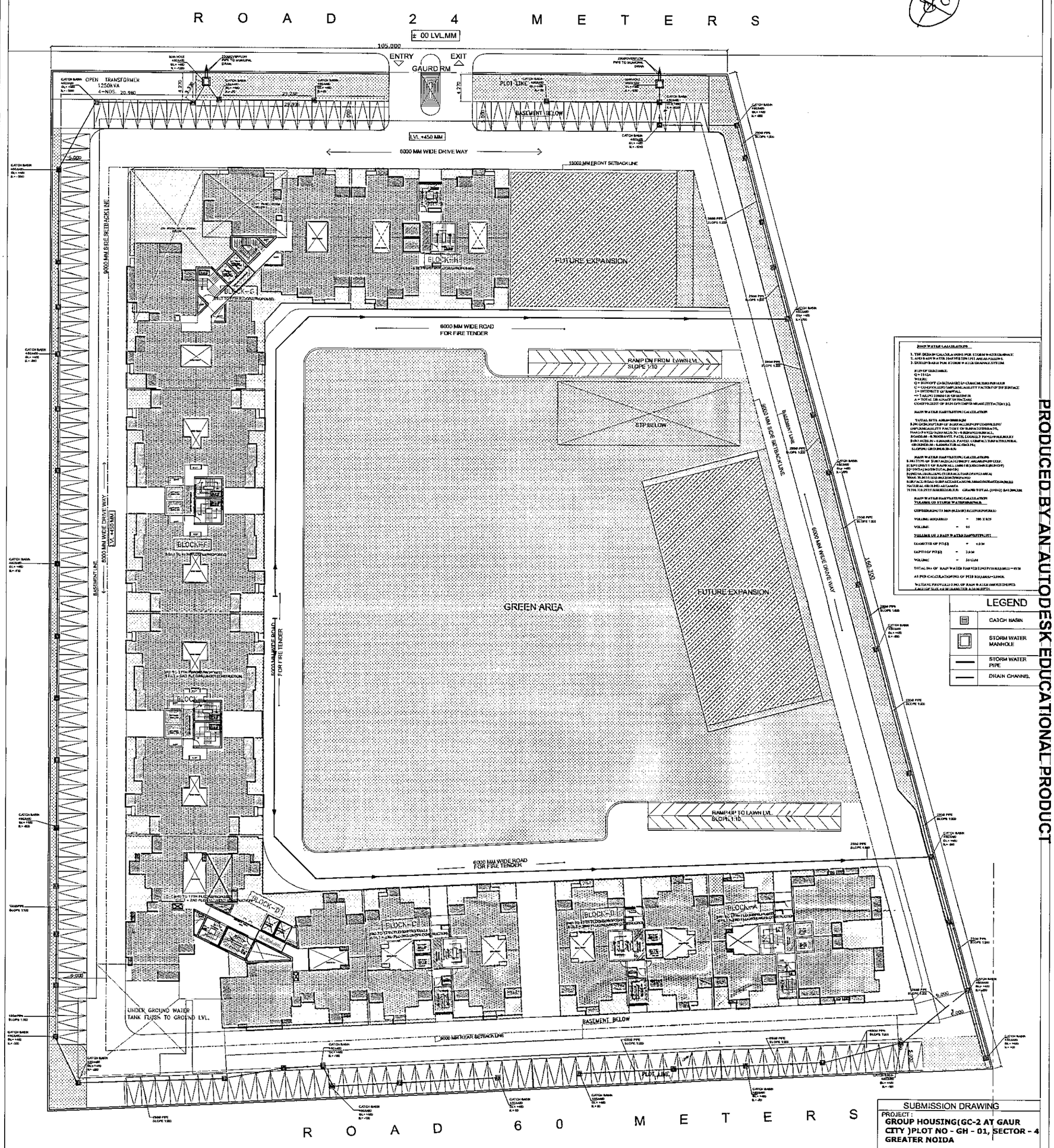

RAIN WATER CALCULATIONS

1. THE DESIGN CALCULATIONS FOR STORM WATER DRAINAGE AND RAIN WATER HARVESTING PIT AREAS FOLLOWS.
2. DESIGN BASIS FOR STORM WATER DRAINAGE SYSTEM

RUN OF DISCHARGE
Q = 18 LSA
WHERE:
Q = RUN OFF (DISCHARGE) IN CUMECS/SEC PER HOUR
C = COEFFICIENT/IMPERMEABILITY FACTOR OF DIFFERENCE
I = INTENSITY OF RAINFALL
A = TOTAL DRAINAGE IN HECTARE
COEFFICIENT OF RUN OFF/IMPERMEABILITY FACTOR (C)

RAIN WATER HARVESTING CALCULATION

TOTAL SITE AREA=[illegible]
[illegible]

RAIN WATER HARVESTING CALCULATION
[illegible]

RAIN WATER HARVESTING CALCULATION
VOLUME OF STORM WATER DRAINAGE

CONSIDERING 15 MM (0.2 M) REGIN(PERCOLE)

VOLUME REQUIRED = 300 X 0.25
VOLUME = 95

VOLUME OF 2 RAIN WATER HARVESTING PIT

DIAMETER OF PIT(S) = 4.0 M
DEPTH OF PIT(S) = 3.0 M
VOLUME = 35 CUM

TOTAL NO. OF RAIN WATER HARVESTING PITS REQUIRED = 95 M
AT PER CALCULATION NO. OF PITS REQUIRED = 2.5 NOS.
WE HAVE PROVIDED 2 NO. OF RAIN WATER HARVESTING PITS EACH OF SIZE OF 4 M DIAMETER X 3 M DEPTH

LEGEND

▤	CATCH BASIN
▣	STORM WATER MANHOLE
—	STORM WATER PIPE
—	DRAIN CHANNEL

AIG INFRATECH (INDIA) PVT. LTD.

SUBMISSION DRAWING

PROJECT :
GROUP HOUSING(GC-2 AT GAUR CITY)PLOT NO - GH - 01, SECTOR - 4 GREATER NOIDA

CLIENT :
AIG INFRATECH INDIA PVT. LTD.

SHEET TITLE :
SURFACE WATER DRAINAGE LAYOUT

DATE : 06.12.13	DRG.NO : PL-4
SCALE : 1:400	NORTH: N
OWNER'S SIGN	ARCHITECT'S SIGN

ARCHITECTS:
SPACE DESIGN GROUP
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