

| REVISIONS                      | BY  |
|--------------------------------|-----|
| REVISED SEPTIC<br>AUG 10, 2005 | WSO |
| REVISED SEPTIC<br>AUG 16, 2005 | WSO |
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**DRIP CALCULATIONS**  
S/L 6 BELLMORE DR. PAINESVILLE TWP. OH. 44077  
BELLMORE SUBDIVISION VOL. 44 PG. 21  
**LITTLE MOUNTAIN HOMES, INC.**

|                      |
|----------------------|
| DRAWN<br>WSO         |
| CHECKED<br>DWN       |
| DATE<br>AUG 05, 2005 |
| SCALE<br>NONE        |
| JOB NO<br>02007-06   |
| SHEET<br>2/5         |
| OF<br>SHEETS         |

# SEPTIC DRIP CALCULATION SHEET

|    |                 |                                                       |      |                                     |        |       |
|----|-----------------|-------------------------------------------------------|------|-------------------------------------|--------|-------|
| 1  | 417             | GALLONS PER DAY                                       | 4    | BEDROOMS                            |        |       |
| 2  | 0.27            | GPD/L F TUBING INFILTRATIVE SOIL LOADING RATE         |      |                                     |        |       |
| 3  | 119             | FT (Length)                                           | 14.5 | FT (Width) AREA FOR DISPOSAL LAYOUT | 1725.5 | FT SQ |
| 4  | 0.18            | GPD/FT2 AREA SOIL LOADING RATE PROVIDED               |      |                                     |        |       |
| 5  | 2               | ZONES                                                 |      |                                     |        |       |
| 6  | 1904            | TOTAL DRIPPER LINE PROVIDED                           |      |                                     |        |       |
| 7  | 2000            | SEPTIC TANK SIZE                                      |      |                                     |        |       |
| 8  | 2000            | DOSING TANK SIZE                                      |      |                                     |        |       |
| 9  | 33              | GALLONS PER INCH IN DOSING TANK (Recommended Minimum) |      |                                     |        |       |
| 10 | <u>ZONE ONE</u> |                                                       |      |                                     |        |       |
| 11 | 862.75          | TOTAL ABSORPTION AREA                                 |      |                                     |        |       |
| 12 | 952             | LINEAR FEET OF DRIP TUBING                            |      |                                     |        |       |
| 13 | 238             | LONGEST LATERAL LENGTH                                |      |                                     |        |       |
| 14 | 4.84            | DOSING FLOW RATE                                      |      |                                     |        |       |
| 15 | 4               | NO RETURN FIELD FLUSH CONNECTIONS                     |      |                                     |        |       |
| 16 | 6.4             | FIELD FLUSH FLOW RATE                                 |      |                                     |        |       |
| 17 | 11.24           | TOTAL FLOW REQUIRED                                   |      |                                     |        |       |
| 18 | <u>ZONE TWO</u> |                                                       |      |                                     |        |       |
| 19 | 862.75          | TOTAL ABSORPTION AREA                                 |      |                                     |        |       |
| 20 | 952             | LINEAR FEET OF DRIP TUBING                            |      |                                     |        |       |
| 21 | 238             | LONGEST LATERAL LENGTH                                |      |                                     |        |       |
| 22 | 4.84            | DOSING FLOW RATE                                      |      |                                     |        |       |
| 23 | 4               | NO RETURN FIELD FLUSH CONNECTIONS                     |      |                                     |        |       |
| 24 | 6.4             | FIELD FLUSH FLOW RATE                                 |      |                                     |        |       |
| 25 | 11.24           | TOTAL FLOW REQUIRED                                   |      |                                     |        |       |
| 26 | 12              | MAXIMUM DESIGN FLUSHING FLOW                          |      |                                     |        |       |
| 27 | 11              | FEET OF HEAD LOSS FROM HYDRAULIC UNIT (Based on #26)  |      |                                     |        |       |

|    |                                                                            |                                                                     |            |               |           |               |       |                  |     |    |
|----|----------------------------------------------------------------------------|---------------------------------------------------------------------|------------|---------------|-----------|---------------|-------|------------------|-----|----|
| 28 | <u>HYDRAULIC UNIT SUPPLY LINE</u>                                          |                                                                     |            |               |           |               |       |                  |     |    |
| 29 | 1.5                                                                        | PIPE DIAMETER                                                       |            |               |           |               |       |                  |     |    |
| 30 | 20                                                                         | LENGTH SUPPLY PIPE                                                  |            |               |           |               |       |                  |     |    |
| 31 | 5                                                                          | FEET OF STATIC LIFT                                                 |            |               |           |               |       |                  |     |    |
| 32 | 7                                                                          | TOTAL FEET HEAD LOSS IN LINE (Dynamic Head Loss + #31)              |            |               |           |               |       |                  |     |    |
| 33 | <u>FORCE MAIN SUPPLY LINE PIPE SIZE &amp; LENGTH:</u>                      |                                                                     |            |               |           |               |       |                  |     |    |
| 34 | 1"                                                                         | ZONE 1 SIZE                                                         | 100        | ZONE 1 LENGHT | 8         | FT HEAD LOSS  |       |                  |     |    |
| 35 | 1"                                                                         | ZONE 2 SIZE                                                         | 100        | ZONE 2 LENGTH | 8         | FT HEAD LOSS  |       |                  |     |    |
| 36 | <u>RETURN FLUSH LINE SIZE &amp; RETURN:</u>                                |                                                                     |            |               |           |               |       |                  |     |    |
| 37 | 1"                                                                         | ZONE 1 SIZE                                                         | 100        | ZONE 1 LENGHT | 3         | FT HEAD LOSS  |       |                  |     |    |
| 38 | 1"                                                                         | ZONE 2 SIZE                                                         | 100        | ZONE 2 LENGTH | 3         | FT HEAD LOSS  |       |                  |     |    |
| 39 | 2                                                                          | FEET OF TOTAL STATIC HEAD LOSS (Vertical Lift) FROM HU TO DRIP TUBE |            |               |           |               |       |                  |     |    |
| 40 | <u>TOTAL PRESSURE LOSS (Add Items 27, 32 34/35, 37/38, 39 + Flushing):</u> |                                                                     |            |               |           |               |       |                  |     |    |
| 41 | 55                                                                         | "ZONE 1 HEAD LOSS, INCLUDES                                         |            |               | 24        | FEET FLUSHING |       |                  |     |    |
| 42 | 55                                                                         | ZONE 2 HEAD LOSS, INCLUDES                                          |            |               | 24        | FEET FLUSHING |       |                  |     |    |
| 43 | <u>PUMP SIZING:</u>                                                        |                                                                     |            |               |           |               |       |                  |     |    |
| 44 | 55                                                                         | MAXIMUM TOTAL PRESSURE LOSS (Highest 41 or 42)                      |            |               |           |               |       |                  |     |    |
| 45 | 122                                                                        | DISC FILTER BACKFLUSH (#32 + 11511 @ 15 GPM)                        |            |               |           |               |       |                  |     |    |
| 46 | 15                                                                         | GPM @                                                               | 122        | FEET,         | 115       | VOLTS,        | 1     | PHASE,           | 0.5 | HP |
| 47 | <u>TIMED DOSING PER ZONE:</u>                                              |                                                                     |            |               |           |               |       |                  |     |    |
| 48 | <u>ZONE ONE:</u>                                                           |                                                                     |            |               |           |               |       |                  |     |    |
| 49 | 4.84                                                                       | Dosing GPM                                                          |            | 6.46          | MIN /DOSE |               | 31.28 | GALLONS PER DOSE |     |    |
| 50 |                                                                            | 4                                                                   | AVE CYCLES |               | 6.67      | PEAK CYCLES   |       |                  |     |    |
| 51 | <u>ZONE TWO:</u>                                                           |                                                                     |            |               |           |               |       |                  |     |    |
| 52 | 4.84                                                                       | Dosing GPM                                                          |            | 6.46          | MIN /DOSE |               | 31.28 | GALLONS PER DOSE |     |    |
| 53 |                                                                            | 4                                                                   | AVE CYCLES |               | 6.67      | PEAK CYCLES   |       |                  |     |    |
| 54 | 4                                                                          | INCHES DRAWDOWN FLOAT SWITCH SETTING (Minimum 4")"                  |            |               |           |               |       |                  |     |    |
| 55 | Landscape Linear Loading Rate (LLLR):                                      |                                                                     |            |               | LLLR =    | 3.50          |       |                  |     |    |
| 56 | Soil Loading Rate (SLR):                                                   |                                                                     |            |               | SLR =     | 0.24          |       |                  |     |    |