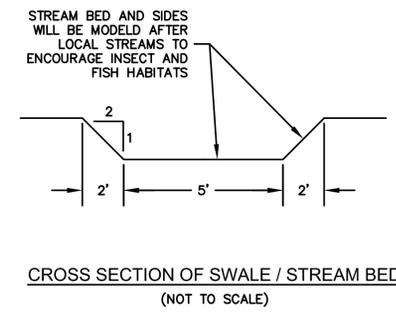




LEGEND

AREA FOR ADDITIONAL VEGETATION	
EXISTING STREAM	
PROPOSED STREAM	

- NOTES:
1. THE REGIONAL STORMWATER MANAGEMENT PLAN HAS DETERMINED THAT THE LAKE IN TAMAQUES PARK SUFFERS FROM TSS, NUTRIENTS AND HEAT POLLUTION.
 2. THE LAKE IS FORMED FOR PIPING WATER FROM THE STREAM INTO THE LAKE. WHEN THE LAKE IS AT CAPACITY PIPE FILLS UP AND WATER HAS NEAR ZERO FLOW OUT OF THE PIPE.
 3. THERE IS A DAM JUST DOWNSTREAM OF THE PIPE FOR THE LAKE. THERE IS A LARGE AMOUNT OF SEDIMENT ACCUMULATING AT THE BOTTOM OF THE STREAM BED WHERE IT MEETS THE DAM.
 4. RUTGERS UNIVERSITY PROPOSES THAT THE MUNICIPALITY DAYLIGHT A SMALL STREAM BED TO REPLACE THE PIPE SYSTEM CURRENTLY USED TO FILL THE LAKE. ANOTHER STREAM SHOULD BE CONSTRUCTED FOR OUTFLOW OF THE LAKE. A STREAM THAT FEEDS AND EMPTIES THAT LAKE WILL INCREASES THE QUALITY OF THE WATER THAN IF PIPING IS USED.
 5. SPLITTING THE STREAM WOULD A NICE AESTHETIC FEATURE TO THE PARK WHILE IMPROVING THE WATER QUALITY OF THE STREAM ITSELF. A PROBLEM WITH THE STREAM BED IS THAT FOR THE PATH IN THE PARK TO CONTINUE AS IT IS A SMALL FOOT BRIDGE WOULD HAVE TO BE BUILT OVER THE PROPOSED STREAM. THIS STREAM SHOULD BE DESIGNED WITH A MEANDERING PATH AND FEATURES THAT WOULD ENCOURAGE MICRO- AND MACROVERBATE HABITATS.
 6. SEDIMENT IS BUILDING UP AROUND THE DAM DOWNSTREAM OF THE PIPE FOR THE LAKE. IT IS RECOMMENDED THAT THIS DAM BE REMOVED AND THE STREAM BED BE REGRADED TO MEET THE NEW SLOPE REQUIRED FROM THE LOSS OF THE DAM. REMOVING THE DAM FROM THE STREAM WOULD HELP TO ENCOURAGE FISH TO HABITATE THE STREAM.
 7. THE HEAT POLLUTION FROM THE LAKE CAN BE REMEDIED BY ADDING MORE VEGETATION TO THE STREAM AND LAKE. THE SHADE FROM THE ADDITIONAL VEGETATION WILL LOWER THE TEMPERATURE FROM THE STREAM AND LAKE.
 8. THIS IS NOT FOR PERMITTING OR CONSTRUCTION USE, THIS DRAWING IS ONLY TO BE USED FOR CONCEPTUAL PURPOSES.



CHRISTOPHER C. OBROPTA, Ph.D., P.E.
 PROFESSIONAL ENGINEER - NJ LICENSE # 37632

DESIGNED: SPW CCO
 CHECKED: CCO
 APPROVED: CCO

DATE: _____

MILESTONE 4 OF REGIONAL STORMWATER MANAGEMENT PLAN FOR THE
 ROBINSON'S BRANCH
 NEW JERSEY DEPARTMENT OF ENVIRONMENTAL PROTECTION
 TAMAQUES PARK
 LAKE REHABILITATION



JOB	CONCEPT SHEET #
RBRANCH	TOTAL
3	7

DRAFT