

**TABLE 2.4 : MOLASSES BASED DISTILLERY OPERATION : 80 KLPD ENA : BIOGAS - RO & BIOCOMPOSTING ROUTE****WATER BALANCE**

ALL FIGURES IN METRIC TONNES (MT)

INPUTS			OUTPUTS		
PROCESS WATER IN FERMENTATION	710	MT	PROCESS STEAM CONDENSATE	240	MT
DM WATER FOR AS DILUTION	720	MT	SPENT LEES (PRERECTIFIER)	104	MT
DM WATER FOR BOILER FEED	312	MT	SPENT LEES (RECTIFIER)	720	MT
SOFT WATER FOR ANALYSER FLASH TANK	152	MT	BOTTLE WASHING	40	MT
SOFT WATER FOR VACUUM PUMP & OTHERS	100	MT	CT EVAPORATION & DRIFT LOSSES	600	MT
BLENDING (6000 CASES)	30	MT	DOMESTIC CONSUMPTION	20	MT
BOTTLE WASHINGS	40	MT	WATER IN SPENT WASH	895	MT
WATER IN MOLASSES	89	MT	PUMP SEALING / PURGE	100	MT
SOFT WATER MAKEUP FOR COOLING TOWER	600	MT	BOILER DRIFT & BLOW DOWN	24	MT
OTHER DOMESTIC USAGE	20	MT	WATER IN PRODUCT	30	MT
	<b>2773</b>	<b>MT</b>		<b>2773</b>	<b>MT</b>
RECYCLE & UTILIZATION STREAMS					
LEES RECYCLE FOR RS DILUTION	504	MT			
STEAM CONDENSATE RECYCLE FOR BOILER	272	MT			
SPENT LEES (RECT) - COOLING TOWER MAKEUP	216	MT			
PERMEATE RECYCLE TO PROCESS & COOLING TOWER	504	MT			
<b>Total Recycling / Re-utilisations of Water per day</b>	<b>1496</b>	<b>MT</b>			
<b>TOTAL FRESH WATER INPUT</b>	<b>1277</b>	<b>MT</b>			

Note: Figures given above are only indicative and shall vary based on Molasses Characteristics and overall plant operating parameters.