Slurry & Soiled Water Storage Calculations

Name	<u>Charlie Ryan</u>	<u>County</u>	<u>Cork</u>
Date	10/06/2024	Wks storage	16
		Rainfall/ wk	37

Table 1.		Nea	t Slurry Pr	oduced in	16	weeks]
Stock in Cubicles, Slats, Yards, etc.					Stock on Straw Bedding, Fed in Yards, Slats, Concrete				1
							ssage, etc.		
Animals		No.	m3/16 Weeks	Total m3	No.	% time on straw bed	m3/16 Weeks	Total m3 slurry	M3 FYM
Dairy Cows		90	5.28	475.2		Straw bed	5.28		
Cattle 0-1 Years		50	2.4				2.40		
Cattle 1-2 Years		30	4.16				4.16		
Cattle >2 Years	'	2	4.16	8.3	(4.16		
Oddie - Z Tears			Total A	728.3			Total B		
		Nea	t Slurry Prod	duced in 16	weeks	,	Total A + B =	728.3	
Table 2 Saile	d Water F	Production /	asserted by	rainfall an	1				1
Table 2. Soile					District of	14. 0.3			
'' '		pends on whether it is discharged to		Discharged to Soiled					
S	oiled wate	er tank or slu	rry tank).0		Water Tank Dischar			ed to Slurry Tank	16
Discharged	d toSoiled			Total m3	1				weeks
water (SW) or S					31 Days	Total			
, ,	tank	Length m	Width m		Rainfall mm	Produced	Rainfall m	Total Produced m3	
	l sl	20.19	***************************************		0.164		0.592	1010111100000001110	
					Total C		Total D		†
Table 3. Parlou			roduced	I Nissanta a sa a f	1				1- 0
Discharged to Soiled W		ater (SW) or rry (SL) tank	sw	Number of cows	90		ed for closed	83.7	E SW F SL
		- , ,				<u> </u>	riod		IL ST
Table 4. Slurry (Covered tanks					ty of tank less r	ainfall to tan	k + .3m freebo	oard)	
								Covered Tank	
						Open Tank Deduct		Deduct 0.2m	Nett
Tank Open (O) or		Length m	Width m		Gross	Rainfall to tank plus 0.3m		Freeboard (L x W x	Capacity
covered (C)		ľ.)	(W)	Depth m	Capacity m3	l	board	.2)	M3
Cattle shed	T C	44.6	3.5					31.2	343.4
Cow Shed	С	35.0	3.5		294.0			24.5	269.5
Cow Shed 2	C	16.7	3.5	2.4				11.7	128.6
							& Associate	d Soiled Water	741.5
Total	Slurry Pr	oduced Incl	uding Soiled	Water from	Yards Discharg	ing to Slurry			728.3
							Surp	olus / Deficit	<u>13.2</u>
		4. b FYN	I storage - 0).6m deep un	ider animals un	limited in co	/ered manure	store	
Shed		Length m	Width m	Depth m					capacity
Capacity for fym									
Surplus / Deficit									
Table 5. Soiled	Water St	orage Capad	city					ı	
								Covered Tank	
					1	Open Ta	ınk Deduct	Deduct 0.2m	1
Tank Open (O) or		Length m	Width m		Gross	31 days Ra	infall to tank	Freeboard (L x W x	Nett
	/ered (C)	(Ľ)	(W)	Depth m	Capacity m3		Freeboard	.2)	Capacity
Dairy tank	0	7.6	3.5				1.4	<u> </u>	59.5
Capacity For Soiled Water									
Total Soiled Water Produced which is Discharged to Separate Soiled Water Tanks = Total C + E									
							Surr	olus / Deficit	-24.2