

**SUHKRULAHUSES, VALGES SUHKRULAHUSES, INVERTSUHKRULAHUSES,  
VALGES INVERTSUHKRULAHUSES, INVERTSUHKRUSIIRUPIS NING VALGES  
INVERTSUHKRUSIIRUPIS KUIVAINESISALDUSE MÄÄRAMISE MEETOD  
(REFRAKTOMEETRILINE MEETOD)**

**1. Kasutusala**

Meetod võimaldab määrata kuivainesisaldust suhkrulahuses, valges suhkrulahuses, invertsuhkrulahuses, valges invertsuhkrulahuses, invertsuhkrusiirupis ning valges invertsuhkrusiirupis.

**2. Määratlus**

Kuivainesisaldus on selle meetodi puhul näitaja, mille väärtus mõõdetakse murdumisnäitaja kaudu.

**3. Põhimõte**

Uuritava ainekoguse murdumisnäitaja määratakse temperatuuril 20 °C ja arvestatakse kuivainesisalduseks tabeli abil, milles on toodud kontsentratsiooni ja murdumisnäitaja omavaheline sõltuvus.

**4. Seadmed ja vahendid**

**4.1.** refraktomeeter, kümnetuhandiku täpsusega, varustatud termomeetri ja veetsirkulatsioonipumbaga, mis on ühendatud temperatuurile  $20 \pm 0,5$  °C reguleeritud veevanniga;

**4.2.** naatriumilambiga valgusallikas.

**5. Töö käik**

**5.1.** Juhul kui proov sisaldab kristalle, tuleb need lahustada, lahjendades proovi vahekorras 1 : 1 (massi järgi).

**5.2.** Proovi murdumisnäitaja mõõdetakse refraktomeetris temperatuuril 20 °C.

**6. Tulemuste esitamine**

**6.1.** Alapunktis 6.4 toodud andmete põhjal leitakse proovi kuivainesisaldus sahharoosilahuste murdumisnäitajate alusel. Invertsuhkru puhul lisatakse alapunktis 6.4 saadud tulemusele 0,022 iga invertsuhkru protsendi kohta.

**6.2.** Juhul kui proovi lahjendati 1 : 1 (massi järgi) veega, tuleb leitud kuivainesisaldus korrutada kahega.

**6.3.** Kahe üheaegse või järjestikuse sama proovi määramise tulemuste erinevus ei tohi ületada 0,2 g 100 g proovi kohta samades tingimustes sama analüüsitegija määratuna.

**6.4.** Sahharoosilahuste murdumisnäitajad (n) sahharoosilahustes temperatuuril 20 °C<sup>1</sup> on toodud järgmises tabelis:

<b>n</b>	<b>Sahharoos</b>	<b>n</b>	<b>Sahharoos</b>	<b>n</b>	<b>Sahharoos</b>	<b>n</b>	<b>Sahharoos</b>
<b>(20 C)</b>	<b>(%)</b>	<b>(20 C)</b>	<b>(%)</b>	<b>(20 C)</b>	<b>(%)</b>	<b>(20 C)</b>	<b>(%)</b>
1,3330	0,009	1,3768	27,575	1,4206	50,264	1,4644	69,593
1,3331	0,078	1,3769	27,632	1,4207	50,312	1,4645	69,634
1,3332	0,149	1,3770	27,688	1,4208	50,359	1,4646	69,675
1,3333	0,218	1,3771	27,745	1,4209	50,407	1,4647	69,716
1,3334	0,288	1,3772	27,802	1,4210	50,454	1,4648	69,757
1,3335	0,358	1,3773	27,858	1,4211	50,502	1,4649	69,798
1,3336	0,428	1,3774	27,915	1,4212	50,549	1,4650	69,839
1,3337	0,498	1,3775	27,971	1,4213	50,596	1,4651	69,880
1,3338	0,567	1,3776	28,028	1,4214	50,644	1,4652	69,921
1,3339	0,637	1,3777	28,084	1,4215	50,691	1,4653	69,962
1,3340	0,707	1,3778	28,141	1,4216	50,738	1,4654	70,003
1,3341	0,776	1,3779	28,197	1,4217	50,786	1,4655	70,044
1,3342	0,846	1,3780	28,253	1,4218	50,833	1,4656	70,085
1,3343	0,915	1,3781	28,310	1,4219	50,880	1,4657	70,126
1,3344	0,985	1,3782	28,366	1,4220	50,928	1,4658	70,167
1,3345	1,054	1,3783	28,422	1,4221	50,975	1,4659	70,208
1,3346	1,124	1,3784	28,479	1,4222	51,022	1,4660	70,249
1,3347	1,193	1,3785	28,535	1,4223	51,069	1,4661	70,290
1,3348	1,263	1,3786	28,591	1,4224	51,116	1,4662	70,331
1,3349	1,332	1,3787	28,648	1,4225	51,164	1,4663	70,372
1,3350	1,401	1,3788	28,704	1,4226	51,211	1,4664	70,413
1,3351	1,470	1,3789	28,760	1,4227	51,258	1,4665	70,453
1,3352	1,540	1,3790	28,816	1,4228	51,305	1,4666	70,494
1,3353	1,609	1,3791	28,872	1,4229	51,352	1,4667	70,535

1,3354	1,678	1,3792	28,928	1,4230	51,399	1,4668	70,576
1,3355	1,747	1,3793	28,984	1,4231	51,446	1,4669	70,617
1,3356	1,816	1,3794	29,040	1,4232	51,493	1,4670	70,658
1,3357	1,885	1,3795	29,096	1,4233	51,540	1,4671	70,698
1,3358	1,954	1,3796	29,152	1,4234	51,587	1,4672	70,739
1,3359	2,023	1,3797	29,208	1,4235	51,634	1,4673	70,780
1,3360	2,092	1,3798	29,264	1,4236	51,681	1,4674	70,821
1,3361	2,161	1,3799	29,320	1,4237	51,728	1,4675	70,861
1,3362	2,230	1,3800	29,376	1,4238	51,775	1,4676	70,902
1,3363	2,299	1,3801	29,432	1,4239	51,822	1,4677	70,943
1,3364	2,367	1,3802	29,488	1,4240	51,869	1,4678	70,984
1,3365	2,436	1,3803	29,544	1,4241	51,916	1,4679	71,024
1,3366	2,505	1,3804	29,600	1,4242	51,963	1,4680	71,065
1,3367	2,574	1,3805	29,655	1,4243	52,010	1,4681	71,106
1,3368	2,642	1,3806	29,711	1,4244	52,057	1,4682	71,146
1,3369	2,711	1,3807	29,767	1,4245	52,104	1,4683	71,187
1,3370	2,779	1,3808	29,823	1,4246	52,150	1,4684	71,228
1,3371	2,848	1,3809	29,878	1,4247	52,197	1,4685	71,268
1,3372	2,917	1,3810	29,934	1,4248	52,244	1,4686	71,309
1,3373	2,985	1,3811	29,989	1,4249	52,291	1,4687	71,349
1,3374	3,053	1,3812	30,045	1,4250	52,338	1,4688	71,390
1,3375	3,122	1,3813	30,101	1,4251	52,384	1,4689	71,431
1,3376	3,190	1,3814	30,156	1,4252	52,431	1,4690	71,471
1,3377	3,259	1,3815	30,212	1,4253	52,478	1,4691	71,512
1,3378	3,327	1,3816	30,267	1,4254	52,524	1,4692	71,552
1,3379	3,395	1,3817	30,323	1,4255	52,571	1,4693	71,593
1,3380	3,463	1,3818	30,378	1,4256	52,618	1,4694	71,633

1,3381	3,532	1,3819	30,434	1,4257	52,664	1,4695	71,674
1,3382	3,600	1,3820	30,489	1,4258	52,711	1,4696	71,714
1,3383	3,668	1,3821	30,544	1,4259	52,758	1,4697	71,755
1,3384	3,736	1,3822	30,600	1,4260	52,804	1,4698	71,795
1,3385	3,804	1,3823	30,655	1,4261	52,851	1,4699	71,836
1,3386	3,872	1,3824	30,711	1,4262	52,897	1,4700	71,876
1,3387	3,940	1,3825	30,766	1,4263	52,944	1,4701	71,917
1,3388	4,008	1,3826	30,821	1,4264	52,990	1,4702	71,957
1,3389	4,076	1,3827	30,876	1,4265	53,037	1,4703	71,998
1,3390	4,144	1,3828	30,932	1,4266	53,083	1,4704	72,038
1,3391	4,212	1,3829	30,987	1,4267	53,130	1,4705	72,078
1,3392	4,279	1,3830	31,042	1,4268	53,176	1,4706	72,119
1,3393	4,347	1,3831	31,097	1,4269	53,223	1,4707	72,159
1,3394	4,415	1,3832	31,152	1,4270	53,269	1,4708	72,199
1,3395	4,483	1,3833	31,207	1,4271	53,316	1,4709	72,240
1,3396	4,550	1,3834	31,262	1,4272	53,362	1,4710	72,280
1,3397	4,618	1,3835	31,317	1,4273	53,408	1,4711	72,320
1,3398	4,686	1,3836	31,372	1,4274	53,455	1,4712	72,361
1,3399	4,753	1,3837	31,428	1,4275	53,501	1,4713	72,401
1,3400	4,821	1,3838	31,482	1,4276	53,548	1,4714	72,441
1,3401	4,888	1,3839	31,537	1,4277	53,594	1,4715	72,482
1,3402	4,956	1,3840	31,592	1,4278	53,640	1,4716	72,522
1,3403	5,023	1,3841	31,647	1,4279	53,686	1,4717	72,562
1,3404	5,091	1,3842	31,702	1,4280	53,733	1,4718	72,602
1,3405	5,158	1,3843	31,757	1,4281	53,779	1,4719	72,643
1,3406	5,225	1,3844	31,812	1,4282	53,825	1,4720	72,683
1,3407	5,293	1,3845	31,867	1,4283	53,871	1,4721	72,723

1,3408	5,360	1,3846	31,922	1,4284	53,918	1,4722	72,763
1,3409	5,427	1,3847	31,976	1,4285	53,964	1,4723	72,803
1,3410	5,494	1,3848	32,031	1,4286	54,010	1,4724	72,843
1,3411	5,562	1,3849	32,086	1,4287	54,056	1,4725	72,884
1,3412	5,629	1,3850	32,140	1,4288	54,102	1,4726	72,924
1,3413	5,696	1,3851	32,195	1,4289	54,148	1,4727	72,964
1,3414	5,763	1,3852	32,250	1,4290	54,194	1,4728	73,004
1,3415	5,830	1,3853	32,304	1,4291	54,241	1,4729	73,044
1,3416	5,897	1,3854	32,359	1,4292	54,287	1,4730	73,084
1,3417	5,964	1,3855	32,414	1,4293	54,333	1,4731	73,124
1,3418	6,031	1,3856	32,468	1,4294	54,379	1,4732	73,164
1,3419	6,098	1,3857	32,523	1,4295	54,425	1,4733	73,204
1,3420	6,165	1,3858	32,577	1,4296	54,471	1,4734	73,244
1,3421	6,231	1,3859	32,632	1,4297	54,517	1,4735	73,285
1,3422	6,298	1,3860	32,686	1,4298	54,563	1,4736	73,325
1,3423	6,365	1,3861	32,741	1,4299	54,609	1,4737	73,365
1,3424	6,432	1,3862	32,795	1,4300	54,655	1,4738	73,405
1,3425	6,498	1,3863	32,849	1,4301	54,701	1,4739	73,445
1,3426	6,565	1,3864	32,904	1,4302	54,746	1,4740	73,485
1,3427	6,632	1,3865	32,958	1,4303	54,792	1,4741	73,524
1,3428	6,698	1,3866	33,013	1,4304	54,838	1,4742	73,564
1,3429	6,765	1,3867	33,067	1,4305	54,884	1,4743	73,604
1,3430	6,831	1,3868	33,121	1,4306	54,930	1,4744	73,644
1,3431	6,898	1,3869	33,175	1,4307	54,976	1,4745	73,684
1,3432	6,964	1,3870	33,230	1,4308	55,022	1,4746	73,724
1,3433	7,031	1,3871	33,284	1,4309	55,067	1,4747	73,764
1,3434	7,097	1,3872	33,338	1,4310	55,113	1,4748	73,804

1,3435	7,164	1,3873	33,392	1,4311	55,159	1,4749	73,844
1,3436	7,230	1,3874	33,446	1,4312	55,205	1,4750	73,884
1,3437	7,296	1,3875	33,500	1,4313	55,250	1,4751	73,924
1,3438	7,362	1,3876	33,555	1,4314	55,296	1,4752	73,963
1,3439	7,429	1,3877	33,609	1,4315	55,347	1,4753	74,003
1,3440	7,495	1,3878	33,663	1,4316	55,388	1,4754	74,043
1,3441	7,561	1,3879	33,717	1,4317	55,433	1,4755	74,083
1,3442	7,627	1,3880	33,771	1,4318	55,479	1,4756	74,123
1,3443	7,693	1,3881	33,825	1,4319	55,524	1,4757	74,162
1,3444	7,759	1,3882	33,879	1,4320	55,570	1,4758	74,202
1,3445	7,825	1,3883	33,933	1,4321	55,616	1,4759	74,242
1,3446	7,891	1,3884	33,987	1,4322	55,661	1,4760	74,282
1,3447	7,957	1,3885	34,040	1,4323	55,707	1,4761	74,321
1,3448	8,023	1,3886	34,094	1,4324	55,752	1,4762	74,361
1,3449	8,089	1,3887	34,148	1,4325	55,798	1,4763	74,401
1,3450	8,155	1,3888	34,202	1,4326	55,844	1,4764	74,441
1,3451	8,221	1,3889	34,256	1,4327	55,889	1,4765	74,480
1,3452	8,287	1,3890	34,310	1,4328	55,935	1,4766	74,520
1,3453	8,352	1,3891	34,363	1,4329	55,980	1,4767	74,560
1,3454	8,418	1,3892	34,417	1,4330	56,026	1,4768	74,599
1,3455	8,484	1,3893	34,471	1,4331	56,071	1,4769	74,639
1,3456	8,550	1,3894	34,524	1,4332	56,116	1,4770	74,678
1,3457	8,615	1,3895	34,578	1,4333	56,162	1,4771	74,718
1,3458	8,681	1,3896	34,632	1,4334	56,207	1,4772	74,758
1,3459	8,746	1,3897	34,685	1,4335	56,253	1,4773	74,797
1,3460	8,812	1,3898	34,739	1,4336	56,298	1,4774	74,837
1,3461	8,878	1,3899	34,793	1,4337	56,343	1,4775	74,876

1,3462	8,943	1,3900	34,846	1,4338	56,389	1,4776	74,916
1,3463	9,008	1,3901	34,900	1,4339	56,434	1,4777	74,956
1,3464	9,074	1,3902	34,953	1,4340	56,479	1,4778	74,995
1,3465	9,139	1,3903	35,007	1,4341	56,525	1,4779	75,035
1,3466	9,205	1,3904	35,060	1,4342	56,570	1,4780	75,074
1,3467	9,270	1,3905	35,114	1,4343	56,615	1,4781	75,114
1,3468	9,335	1,3906	35,167	1,4344	56,660	1,4782	75,153
1,3469	9,400	1,3907	35,220	1,4345	56,706	1,4783	75,193
1,3470	9,466	1,3908	35,274	1,4346	56,751	1,4784	75,232
1,3471	9,531	1,3909	35,327	1,4347	56,796	1,4785	75,272
1,3472	9,596	1,3910	35,380	1,4348	56,841	1,4786	75,311
1,3473	9,661	1,3911	35,434	1,4349	56,887	1,4787	75,350
1,3474	9,726	1,3912	35,487	1,4350	56,932	1,4788	75,390
1,3475	9,791	1,3913	35,540	1,4351	56,977	1,4789	75,429
1,3476	9,856	1,3914	35,593	1,4352	57,022	1,4790	75,469
1,3477	9,921	1,3915	35,647	1,4353	57,067	1,4791	75,508
1,3478	9,986	1,3916	35,700	1,4354	57,112	1,4792	75,547
1,3479	10,051	1,3917	35,753	1,4355	57,157	1,4793	75,587
1,3480	10,116	1,3918	35,806	1,4356	57,202	1,4794	75,626
1,3481	10,181	1,3919	35,859	1,4357	57,247	1,4795	75,666
1,3482	10,246	1,3920	35,912	1,4358	57,292	1,4796	75,705
1,3483	10,311	1,3921	35,966	1,4359	57,337	1,4797	75,744
1,3484	10,375	1,3922	36,019	1,4360	57,382	1,4798	75,784
1,3485	10,440	1,3923	36,072	1,4361	57,427	1,4799	75,823
1,3486	10,505	1,3924	36,125	1,4362	57,472	1,4800	75,862
1,3487	10,570	1,3925	36,178	1,4363	57,517	1,4801	75,901
1,3488	10,634	1,3926	36,231	1,4364	57,562	1,4802	75,941

1,3489	10,699	1,3927	36,284	1,4365	57,607	1,4803	75,980
1,3490	10,763	1,3928	36,337	1,4366	57,652	1,4804	76,019
1,3491	10,828	1,3929	36,389	1,4367	57,697	1,4805	76,058
1,3492	10,892	1,3930	36,442	1,4368	57,742	1,4806	76,098
1,3493	10,957	1,3931	36,495	1,4369	57,787	1,4807	76,137
1,3494	11,021	1,3932	36,548	1,4370	57,832	1,4808	76,176
1,3495	11,086	1,3933	36,601	1,4371	57,877	1,4809	76,215
1,3496	11,150	1,3934	36,654	1,4372	57,921	1,4810	76,254
1,3497	11,215	1,3935	36,706	1,4373	57,966	1,4811	76,294
1,3498	11,279	1,3936	36,759	1,4374	58,011	1,4812	76,333
1,3499	11,343	1,3937	36,812	1,4375	58,056	1,4813	76,372
1,3500	11,407	1,3938	36,865	1,4376	58,101	1,4814	76,411
1,3501	11,472	1,3939	36,917	1,4377	58,145	1,4815	76,450
1,3502	11,536	1,3940	36,970	1,4378	58,190	1,4816	76,489
1,3503	11,600	1,3941	37,023	1,4379	58,235	1,4817	76,528
1,3504	11,664	1,3942	37,075	1,4380	58,279	1,4818	76,567
1,3505	11,728	1,3943	37,128	1,4381	58,324	1,4819	76,607
1,3506	11,792	1,3944	37,180	1,4382	58,369	1,4820	76,646
1,3507	11,856	1,3945	37,233	1,4383	58,413	1,4821	76,685
1,3508	11,920	1,3946	37,286	1,4384	58,458	1,4822	76,724
1,3509	11,984	1,3947	37,338	1,4385	58,503	1,4823	76,763
1,3510	12,048	1,3948	37,391	1,4386	58,547	1,4824	76,802
1,3511	12,112	1,3949	37,443	1,4387	58,592	1,4825	76,841
1,3512	12,176	1,3950	37,495	1,4388	58,637	1,4826	76,880
1,3513	12,240	1,3951	37,548	1,4389	58,681	1,4827	76,919
1,3514	12,304	1,3952	37,600	1,4390	58,726	1,4828	76,958
1,3515	12,368	1,3953	37,653	1,4391	58,770	1,4829	76,997



1,3516	12,431	1,3954	37,705	1,4392	58,815	1,4830	77,036
1,3517	12,495	1,3955	37,757	1,4393	58,859	1,4831	77,075
1,3518	12,559	1,3956	37,810	1,4394	58,904	1,4832	77,113
1,3519	12,623	1,3957	37,862	1,4395	58,948	1,4833	77,152
1,3520	12,686	1,3958	37,914	1,4396	58,993	1,4834	77,191
1,3521	12,750	1,3959	37,967	1,4397	59,037	1,4835	77,230
1,3522	12,813	1,3960	38,019	1,4398	59,082	1,4836	77,269
1,3523	12,877	1,3961	38,071	1,4399	59,126	1,4837	77,308
1,3524	12,940	1,3962	38,123	1,4400	59,170	1,4838	77,347
1,3525	13,004	1,3963	38,175	1,4401	59,215	1,4839	77,386
1,3526	13,067	1,3964	38,228	1,4402	59,259	1,4840	77,425
1,3527	13,131	1,3965	38,280	1,4403	59,304	1,4841	77,463
1,3528	13,194	1,3966	38,332	1,4404	59,348	1,4842	77,502
1,3529	13,258	1,3967	38,384	1,4405	59,392	1,4843	77,541
1,3530	13,321	1,3968	38,436	1,4406	59,437	1,4844	77,580
1,3531	13,384	1,3969	38,488	1,4407	59,481	1,4845	77,619
1,3532	13,448	1,3970	38,540	1,4408	59,525	1,4846	77,657
1,3533	13,511	1,3971	38,592	1,4409	59,569	1,4847	77,696
1,3534	13,574	1,3972	38,644	1,4410	59,614	1,4848	77,735
1,3535	13,637	1,3973	38,696	1,4411	59,658	1,4849	77,774
1,3536	13,700	1,3974	38,748	1,4412	59,702	1,4850	77,812
1,3537	13,763	1,3975	38,800	1,4413	59,746	1,4851	77,851
1,3538	13,826	1,3976	38,852	1,4414	59,791	1,4852	77,890
1,3539	13,890	1,3977	38,904	1,4415	59,835	1,4853	77,928
1,3540	13,953	1,3978	38,955	1,4416	59,879	1,4854	77,967
1,3541	14,016	1,3979	39,007	1,4417	59,923	1,4855	78,006
1,3542	14,079	1,3980	39,059	1,4418	59,967	1,4856	78,045

1,3543	14,141	1,3981	39,111	1,4419	60,011	1,4857	78,083
1,3544	14,204	1,3982	39,163	1,4420	60,056	1,4858	78,122
1,3545	14,267	1,3983	39,214	1,4421	60,100	1,4859	78,160
1,3546	14,330	1,3984	39,266	1,4422	60,144	1,4860	78,199
1,3547	14,393	1,3985	39,318	1,4423	60,188	1,4861	78,238
1,3548	14,456	1,3986	39,370	1,4424	60,232	1,4862	78,276
1,3549	14,518	1,3987	39,421	1,4425	60,276	1,4863	78,315
1,3550	14,581	1,3988	39,473	1,4426	60,320	1,4864	78,353
1,3551	14,644	1,3989	39,525	1,4427	60,364	1,4865	78,392
1,3552	14,707	1,3990	39,576	1,4428	60,408	1,4866	78,431
1,3553	14,769	1,3991	39,628	1,4429	60,452	1,4867	78,469
1,3554	14,832	1,3992	39,679	1,4430	60,496	1,4868	78,508
1,3555	14,894	1,3993	39,731	1,4431	60,540	1,4869	78,546
1,3556	14,957	1,3994	39,782	1,4432	60,584	1,4870	78,585
1,3557	15,019	1,3995	39,834	1,4433	60,628	1,4871	78,623
1,3558	15,082	1,3996	39,885	1,4434	60,672	1,4872	78,662
1,3559	15,144	1,3997	39,937	1,4435	60,716	1,4873	78,700
1,3560	15,207	1,3998	39,988	1,4436	60,759	1,4874	78,739
1,3561	15,269	1,3999	40,040	1,4437	60,803	1,4875	78,777
1,3562	15,332	1,4000	40,091	1,4438	60,847	1,4876	78,816
1,3563	15,394	1,4001	40,142	1,4439	60,891	1,4877	78,854
1,3564	15,456	1,4002	40,194	1,4440	60,935	1,4878	78,892
1,3565	15,518	1,4003	40,245	1,4441	60,979	1,4879	78,931
1,3566	15,581	1,4004	40,296	1,4442	61,023	1,4880	78,969
1,3567	15,643	1,4005	40,348	1,4443	61,066	1,4881	79,008
1,3568	15,705	1,4006	40,399	1,4444	61,110	1,4882	79,046
1,3569	15,767	1,4007	40,450	1,4445	61,154	1,4883	79,084

1,3570	15,829	1,4008	40,501	1,4446	61,198	1,4884	79,123
1,3571	15,891	1,4009	40,553	1,4447	61,241	1,4885	79,161
1,3572	15,953	1,4010	40,604	1,4448	61,285	1,4886	79,199
1,3573	16,016	1,4011	40,655	1,4449	61,329	1,4887	79,238
1,3574	16,078	1,4012	40,706	1,4450	61,372	1,4888	79,276
1,3575	16,140	1,4013	40,757	1,4451	61,416	1,4889	79,314
1,3576	16,201	1,4014	40,808	1,4452	61,460	1,4890	79,353
1,3577	16,263	1,4015	40,860	1,4453	61,503	1,4891	79,391
1,3578	16,325	1,4016	40,911	1,4454	61,547	1,4892	79,429
1,3579	16,387	1,4017	40,962	1,4455	61,591	1,4893	79,468
1,3580	16,449	1,4018	41,013	1,4456	61,634	1,4894	79,506
1,3581	16,511	1,4019	41,064	1,4457	61,678	1,4895	79,544
1,3582	16,573	1,4020	41,115	1,4458	61,721	1,4896	79,582
1,3583	16,634	1,4021	41,166	1,4459	61,765	1,4897	79,620
1,3584	16,696	1,4022	41,217	1,4460	61,809	1,4898	79,659
1,3585	16,758	1,4023	41,268	1,4461	61,852	1,4899	79,697
1,3586	16,819	1,4024	41,318	1,4462	61,896	1,4900	79,735
1,3587	16,881	1,4025	41,369	1,4463	61,939	1,4901	79,773
1,3588	16,943	1,4026	41,420	1,4464	61,983	1,4902	79,811
1,3589	17,004	1,4027	41,471	1,4465	62,026	1,4903	79,850
1,3590	17,066	1,4028	41,522	1,4466	62,070	1,4904	79,888
1,3591	17,127	1,4029	41,573	1,4467	62,113	1,4905	79,926
1,3592	17,189	1,4030	41,623	1,4468	62,156	1,4906	79,964
1,3593	17,250	1,4031	41,674	1,4469	62,200	1,4907	80,002
1,3594	17,311	1,4032	41,725	1,4470	62,243	1,4908	80,040
1,3595	17,373	1,4033	41,776	1,4471	62,287	1,4909	80,078
1,3596	17,434	1,4034	41,826	1,4472	62,330	1,4910	80,116

1,3597	17,496	1,4035	41,877	1,4473	62,373	1,4911	80,154
1,3598	17,557	1,4036	41,928	1,4474	62,417	1,4912	80,192
1,3599	17,618	1,4037	41,978	1,4475	62,460	1,4913	80,231
1,3600	17,679	1,4038	42,029	1,4476	62,503	1,4914	80,269
1,3601	17,741	1,4039	42,080	1,4477	62,547	1,4915	80,307
1,3602	17,802	1,4040	42,130	1,4478	62,590	1,4916	80,345
1,3603	17,863	1,4041	42,181	1,4479	62,633	1,4917	80,383
1,3604	17,924	1,4042	42,231	1,4480	62,677	1,4918	80,421
1,3605	17,985	1,4043	42,282	1,4481	62,720	1,4919	80,459
1,3606	18,046	1,4044	42,332	1,4482	62,763	1,4920	80,497
1,3607	18,107	1,4045	42,383	1,4483	62,806	1,4921	80,534
1,3608	18,168	1,4046	42,433	1,4484	62,849	1,4922	80,572
1,3609	18,229	1,4047	42,484	1,4485	62,893	1,4923	80,610
1,3610	18,290	1,4048	42,534	1,4486	62,936	1,4924	80,648
1,3611	18,351	1,4049	42,585	1,4487	62,979	1,4925	80,686
1,3612	18,412	1,4050	42,635	1,4488	63,022	1,4926	80,724
1,3613	18,473	1,4051	42,685	1,4489	63,065	1,4927	80,762
1,3614	18,534	1,4052	42,736	1,4490	63,108	1,4928	80,800
1,3615	18,595	1,4053	42,786	1,4491	63,152	1,4929	80,838
1,3616	18,655	1,4054	42,836	1,4492	63,195	1,4930	80,876
1,3617	18,716	1,4055	42,887	1,4493	63,238	1,4931	80,913
1,3618	18,777	1,4056	42,937	1,4494	63,281	1,4932	80,951
1,3619	18,837	1,4057	42,987	1,4495	63,324	1,4933	80,989
1,3620	18,898	1,4058	43,037	1,4496	63,367	1,4934	81,027
1,3621	18,959	1,4059	43,088	1,4497	63,410	1,4935	81,065
1,3622	19,019	1,4060	43,138	1,4498	63,453	1,4936	81,103
1,3623	19,080	1,4061	43,188	1,4499	63,496	1,4937	81,140

1,3624	19,141	1,4062	43,238	1,4500	63,539	1,4938	81,178
1,3625	19,201	1,4063	43,288	1,4501	63,582	1,4939	81,216
1,3626	19,262	1,4064	43,338	1,4502	63,625	1,4940	81,254
1,3627	19,322	1,4065	43,388	1,4503	63,668	1,4941	81,291
1,3628	19,382	1,4066	43,439	1,4504	63,711	1,4942	81,329
1,3629	19,443	1,4067	43,489	1,4505	63,754	1,4943	81,367
1,3630	19,503	1,4068	43,539	1,4506	63,797	1,4944	81,405
1,3631	19,564	1,4069	43,589	1,4507	63,840	1,4945	81,442
1,3632	19,624	1,4070	43,639	1,4508	63,882	1,4946	81,480
1,3633	19,684	1,4071	43,689	1,4509	63,925	1,4947	81,518
1,3634	19,745	1,4072	43,739	1,4510	63,968	1,4948	81,555
1,3635	19,805	1,4073	43,789	1,4511	64,011	1,4949	81,593
1,3636	19,865	1,4074	43,838	1,4512	64,054	1,4950	81,631
1,3637	19,925	1,4075	43,888	1,4513	64,097	1,4951	81,668
1,3638	19,985	1,4076	43,938	1,4514	64,139	1,4952	81,706
1,3639	20,045	1,4077	43,988	1,4515	64,182	1,4953	81,744
1,3640	20,106	1,4078	44,038	1,4516	64,225	1,4954	81,781
1,3641	20,166	1,4079	44,088	1,4517	64,268	1,4955	81,819
1,3642	20,226	1,4080	44,138	1,4518	64,311	1,4956	81,856
1,3643	20,286	1,4081	44,187	1,4519	64,353	1,4957	81,894
1,3644	20,346	1,4082	44,237	1,4520	64,396	1,4958	81,932
1,3645	20,406	1,4083	44,287	1,4521	64,439	1,4959	81,969
1,3646	20,466	1,4084	44,337	1,4522	64,481	1,4960	82,007
1,3647	20,525	1,4085	44,386	1,4523	64,524	1,4961	82,044
1,3648	20,585	1,4086	44,436	1,4524	64,567	1,4962	82,082
1,3649	20,645	1,4087	44,486	1,4525	64,609	1,4963	82,119
1,3650	20,705	1,4088	44,535	1,4526	64,652	1,4964	82,157

1,3651	20,765	1,4089	44,585	1,4527	64,695	1,4965	82,194
1,3652	20,825	1,4090	44,635	1,4528	64,737	1,4966	82,232
1,3653	20,884	1,4091	44,684	1,4529	64,780	1,4967	82,269
1,3654	20,944	1,4092	44,734	1,4530	64,823	1,4968	82,307
1,3655	21,004	1,4093	44,783	1,4531	64,865	1,4969	82,344
1,3656	21,063	1,4094	44,833	1,4532	64,908	1,4970	82,381
1,3657	21,123	1,4095	44,882	1,4533	64,950	1,4971	82,419
1,3658	21,183	1,4096	44,932	1,4534	64,993	1,4972	82,456
1,3659	21,242	1,4097	44,981	1,4535	65,035	1,4973	82,494
1,3660	21,302	1,4098	45,031	1,4536	65,078	1,4974	82,531
1,3661	21,361	1,4099	45,080	1,4537	65,120	1,4975	82,569
1,3662	21,421	1,4100	45,130	1,4538	65,163	1,4976	82,606
1,3663	21,480	1,4101	45,179	1,4539	65,205	1,4977	82,643
1,3664	21,540	1,4102	45,228	1,4540	65,248	1,4978	82,681
1,3665	21,599	1,4103	45,278	1,4541	65,290	1,4979	82,718
1,3666	21,658	1,4104	45,327	1,4542	65,333	1,4980	82,755
1,3667	21,718	1,4105	45,376	1,4543	65,375	1,4981	82,793
1,3668	21,777	1,4106	45,426	1,4544	65,417	1,4982	82,830
1,3669	21,836	1,4107	45,475	1,4545	65,460	1,4983	82,867
1,3670	21,896	1,4108	45,524	1,4546	65,502	1,4984	82,905
1,3671	21,955	1,4109	45,574	1,4547	65,544	1,4985	82,942
1,3672	22,014	1,4110	45,623	1,4548	65,587	1,4986	82,979
1,3673	22,073	1,4111	45,672	1,4549	65,629	1,4987	83,016
1,3674	22,132	1,4112	45,721	1,4550	65,672	1,4988	83,054
1,3675	22,192	1,4113	45,770	1,4551	65,714	1,4989	83,091
1,3676	22,251	1,4114	45,820	1,4552	65,756	1,4990	83,128
1,3677	22,310	1,4115	45,869	1,4553	65,798	1,4991	83,165

1,3678	22,369	1,4116	45,918	1,4554	65,841	1,4992	83,202
1,3679	22,428	1,4117	45,967	1,4555	65,883	1,4993	83,240
1,3680	22,487	1,4118	46,016	1,4556	65,925	1,4994	83,277
1,3681	22,546	1,4119	46,065	1,4557	65,967	1,4995	83,314
1,3682	22,605	1,4120	46,114	1,4558	66,010	1,4996	83,351
1,3683	22,664	1,4121	46,163	1,4559	66,052	1,4997	83,388
1,3684	22,723	1,4122	46,212	1,4560	66,094	1,4998	83,425
1,3685	22,781	1,4123	46,261	1,4561	66,136	1,4999	83,463
1,3686	22,840	1,4124	46,310	1,4562	66,178	1,5000	83,500
1,3687	22,899	1,4125	46,359	1,4563	66,221	1,5001	83,537
1,3688	22,958	1,4126	46,408	1,4564	66,263	1,5002	83,574
1,3689	23,017	1,4127	46,457	1,4565	66,305	1,5003	83,611
1,3690	23,075	1,4128	46,506	1,4566	66,347	1,5004	83,648
1,3691	23,134	1,4129	46,555	1,4567	66,389	1,5005	83,685
1,3692	23,193	1,4130	46,604	1,4568	66,431	1,5006	83,722
1,3693	23,251	1,4131	46,652	1,4569	66,473	1,5007	83,759
1,3694	23,310	1,4132	46,701	1,4570	66,515	1,5008	83,796
1,3695	23,369	1,4133	46,750	1,4571	66,557	1,5009	83,833
1,3696	23,427	1,4134	46,799	1,4572	66,599	1,5010	83,870
1,3697	23,486	1,4135	46,848	1,4573	66,641	1,5011	83,907
1,3698	23,544	1,4136	46,896	1,4574	66,683	1,5012	83,944
1,3699	23,603	1,4137	46,945	1,4575	66,725	1,5013	83,981
1,3700	23,661	1,4138	46,994	1,4576	66,767	1,5014	84,018
1,3701	23,720	1,4139	47,043	1,4577	66,809	1,5015	84,055
1,3702	23,778	1,4140	47,091	1,4578	66,851	1,5016	84,092
1,3703	23,836	1,4141	47,140	1,4579	66,893	1,5017	84,129
1,3704	23,895	1,4142	47,188	1,4580	66,935	1,5018	84,166

1,3705	23,953	1,4143	47,237	1,4581	66,977	1,5019	84,203
1,3706	24,011	1,4144	47,286	1,4582	67,019	1,5020	84,240
1,3707	24,070	1,4145	47,334	1,4583	67,061	1,5021	84,277
1,3708	24,128	1,4146	47,383	1,4584	67,103	1,5022	84,314
1,3709	24,186	1,4147	47,431	1,4585	67,145	1,5023	84,351
1,3710	24,244	1,4148	47,480	1,4586	67,186	1,5024	84,388
1,3711	24,302	1,4149	47,528	1,4587	67,228	1,5025	84,424
1,3712	24,361	1,4150	47,577	1,4588	67,270	1,5026	84,461
1,3713	24,419	1,4151	47,625	1,4589	67,312	1,5027	84,498
1,3714	24,477	1,4152	47,674	1,4590	67,354	1,5028	84,535
1,3715	24,535	1,4153	47,722	1,4591	67,396	1,5029	84,572
1,3716	24,593	1,4154	47,771	1,4592	67,437	1,5030	84,609
1,3717	24,651	1,4155	47,819	1,4593	67,479	1,5031	84,645
1,3718	24,709	1,4156	47,868	1,4594	67,521	1,5032	84,682
1,3719	24,767	1,4157	47,916	1,4595	67,563	1,5033	84,719
1,3720	24,825	1,4158	47,964	1,4596	67,604	1,5034	84,756
1,3721	24,883	1,4159	48,013	1,4597	67,646	1,5035	84,792
1,3722	24,941	1,4160	48,061	1,4598	67,688	1,5036	84,829
1,3723	24,998	1,4161	48,109	1,4599	67,729	1,5037	84,866
1,3724	25,056	1,4162	48,158	1,4600	67,771	1,5038	84,903
1,3725	25,114	1,4163	48,206	1,4601	67,813	1,5039	84,939
1,3726	25,172	1,4164	48,254	1,4602	67,854	1,5040	84,976
1,3727	25,230	1,4165	48,302	1,4603	67,896	1,5041	85,013
1,3728	25,287	1,4166	48,350	1,4604	67,938	1,5042	85,049
1,3729	25,345	1,4167	48,399	1,4605	67,979	1,5043	85,086
1,3730	25,403	1,4168	48,447	1,4606	68,021	1,5044	85,123
1,3731	25,460	1,4169	48,495	1,4607	68,063	1,5045	85,159



1,3732	25,518	1,4170	48,543	1,4608	68,104	1,5046	85,196
1,3733	25,576	1,4171	48,591	1,4609	68,146	1,5047	85,233
1,3734	25,633	1,4172	48,639	1,4610	68,187	1,5048	85,269
1,3735	25,691	1,4173	48,687	1,4611	68,229	1,5049	85,306
1,3736	25,748	1,4174	48,735	1,4612	68,270	1,5050	85,343
1,3737	25,806	1,4175	48,784	1,4613	68,312	1,5051	85,379
1,3738	25,863	1,4176	48,832	1,4614	68,353	1,5052	85,416
1,3739	25,921	1,4177	48,880	1,4615	68,395	1,5053	85,452
1,3740	25,978	1,4178	48,928	1,4616	68,436	1,5054	85,489
1,3741	26,035	1,4179	48,976	1,4617	68,478	1,5055	85,525
1,3742	26,093	1,4180	49,023	1,4618	68,519	1,5056	85,562
1,3743	26,150	1,4181	49,071	1,4619	68,561	1,5057	85,598
1,3744	26,207	1,4182	49,119	1,4620	68,602	1,5058	85,635
1,3745	26,265	1,4183	49,167	1,4621	68,643	1,5059	85,672
1,3746	26,322	1,4184	49,215	1,4622	68,685	1,5060	85,708
1,3747	26,379	1,4185	49,263	1,4623	68,726	1,5061	85,744
1,3748	26,436	1,4186	49,311	1,4624	68,768	1,5062	85,781
1,3749	26,493	1,4187	49,359	1,4625	68,809	1,5063	85,817
1,3750	26,551	1,4188	49,407	1,4626	68,850	1,5064	85,854
1,3751	26,608	1,4189	49,454	1,4627	68,892	1,5065	85,890
1,3752	26,665	1,4190	49,502	1,4628	68,933	1,5066	85,927
1,3753	26,722	1,4191	49,550	1,4629	68,974	1,5067	85,963
1,3754	26,779	1,4192	49,598	1,4630	69,016	1,5068	86,000
1,3755	26,836	1,4193	49,645	1,4631	69,057	1,5069	86,036
1,3756	26,893	1,4194	49,693	1,4632	69,098	1,5070	86,072
1,3757	26,950	1,4195	49,741	1,4633	69,139	1,5071	86,109
1,3758	27,007	1,4196	49,788	1,4634	69,181	1,5072	86,145

1,3759	27,064	1,4197	49,836	1,4635	69,222	1,5073	86,182
1,3760	27,121	1,4198	49,884	1,4636	69,263	1,5074	86,218
1,3761	27,178	1,4199	49,931	1,4637	69,304	1,5075	86,254
1,3762	27,234	1,4200	49,979	1,4638	69,346	1,5076	86,291
1,3763	27,291	1,4201	50,027	1,4639	69,387	1,5077	86,327
1,3764	27,348	1,4202	50,074	1,4640	69,428	1,5078	86,363
1,3765	27,405	1,4203	50,122	1,4641	69,469	1,5079	86,399
1,3766	27,462	1,4204	50,169	1,4642	69,510		
1,3767	27,518	1,4205	50,217	1,4643	69,551		

<sup>1</sup> *n*-i väärtused selles tabelis arutati K. Rosenhaueri (ICUMSA) väljatöötatud võrrandi abil, mille programmeerijaks ja arvutajaks oli Frank G. Carpenter (UDSA) ja mis avaldati ajakirjas Sugar Journal 33, lk 15–22 (juuni 1970). Murdumisnäitaja mõõdeti 20 °C juures naatriumlambi nulljoone abil. Suhkrusisaldus massiprotsentides leiti kaalumisel 20 °C juures õhu käes rõhul 760 torri (mm Hg) suhtelisel õhuniiskusel 50%.