

Analytical Research Laboratory

Solution Submission Checklist

(Please read this form carefully before submitting solution samples to the ARL)

ARL Goal: Our primary goal at the ARL is to provide IFAS researchers with quality analyses. Additionally, we strive to provide these services in a friendly and timely manner and at a modest fee. However, quality, timeliness, and cost of analyses are all adversely affected when samples are submitted improperly to the ARL.

Sample Vials You can help by providing standard containers for all of your solution samples.

1. Use only 20-mL scintillation vials (Fisher catalog # 03-337-23C)
 - a. No other containers are acceptable without prior approval.
 - b. The ARL need not accept sample custody if nonstandard containers are used.
2. **The ARL does not recommend scintillation vial reuse** due to contamination problems.
3. The following diagram demonstrates the acceptable organization of scintillation vials in the cardboard containers provided by the vial manufacturer.
 - a. The ARL need not accept sample custody if scintillation vials are sent without cardboard containers.
 - b. **If ARL personnel are available** to reorganize your samples, there will be an additional expense of **\$10.00 per 100 samples** billed to your account.

91	92	93	94	95	96	97	98	99	100
81	82	83	84	85	86	87	88	89	90
71	72	73	74	75	76	77	78	79	80
61	62	63	64	65	66	67	68	69	70
51	52	53	54	55	56	57	58	59	60
41	42	43	44	45	46	47	48	49	50
31	32	33	34	35	36	37	38	39	40
21	22	23	24	25	26	27	28	29	30
11	12	13	14	15	16	17	18	19	20
1	2	3	4	5	6	7	8	9	10

FRONT OF BOX

1. The ARL reserves the right to refuse to analyze samples containing debris.
2. **If ARL personnel are available** to reorganize your samples, an additional **\$1.00 per sample** will be charged to your account to cover filter paper and time costs associated with the filtration process for samples containing debris.

Sample Concentration and Method Selection The ARL recommends that whenever possible, sample concentrations be controlled so that they fall within the linear working range of the ARL's instrumentation through dilutions, and/or sample weight to volume ratios prior to the arrival of the samples at the lab. While the ARL can and does perform dilutions at the bench, we cannot guarantee to match the exact matrix in which you prepared your samples, which may introduce error. In addition, there will be a fee of **\$1.00 per dilution per sample** charged to your account.

A list of current PQL's, linear working ranges, and method references can be found on our website. Please check these ranges and methods to insure that the analysis you have selected is applicable to the sample matrix that you are submitting and will provide you with the information you want. **The ARL is not responsible for incorrect method selection on the part of the researcher and you will be charged for all analyses that you have selected and that the ARL has performed.**

Sample Matrix Solvents or solutions with elevated salt concentrations, excessive acid/base concentrations, or highly organic matrices can cause instrumentation damage and/or destroy delicate instrument parts.

1. If you have samples with an unusual matrix, please contact the ARL prior to submitting your samples. This includes samples with salt or acid concentrations exceeding 1.0 molar, samples extracted using organic chelating agents, samples of a basic nature, and samples processed using hydrofluoric acid. This information should also be included in writing on your sample analysis request form.
2. If you do not contact the ARL and instrumentation is damaged during the analysis of your samples, and it is determined that the damage was due to the sample matrix, your account will be charged for the parts necessary to repair the instrument.

Please note: Many IFAS researchers have already incorporated the above requests with little or no disruption to their sample preparation/submission program. Unfortunately, additional charges, lost productivity, and the return of unanalyzed samples are all potential consequences of improperly prepared samples. Please do not hesitate to contact the ARL if you are unclear about any of the above instructions, or if you have any other questions or comments.