



Kendall Optometry



Ministry, Inc

**Glasses
Inventory
7.1-1
Updates**

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1.0 INTRODUCTION

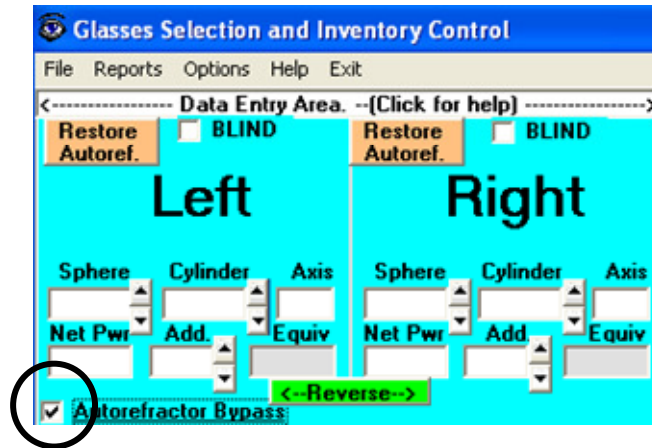
The purpose of this document is to describe new features added to the Glasses Inventory program which have not yet been documented either in the online program documentation or the Glasses Inventory and Glasses Reader usage manual. When this information is included in these documents, this manual will be obsolete.

2.0 Additional Feature List

Most of these new features were created to increase the number of valid matches which can be obtained by an inexperienced operator.

2.1 Autorefractor Bypass

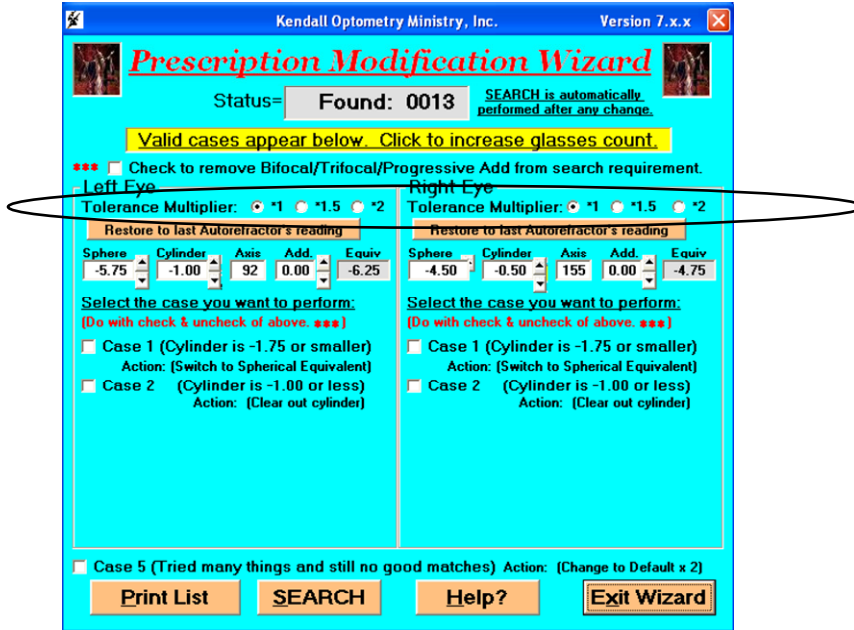
The Autorefractor bypass feature was created to allow full operation of the program when either an autorefractor is not available or it is no longer operational. This feature is enabled by clicking the “Autorefractor Bypass” button on the main window as shown below.



This feature is not cleared by depressing the CLEAR button. To clear this feature, you must click the above checkmark again.

2.2 Wizard Tolerance Multiplier.

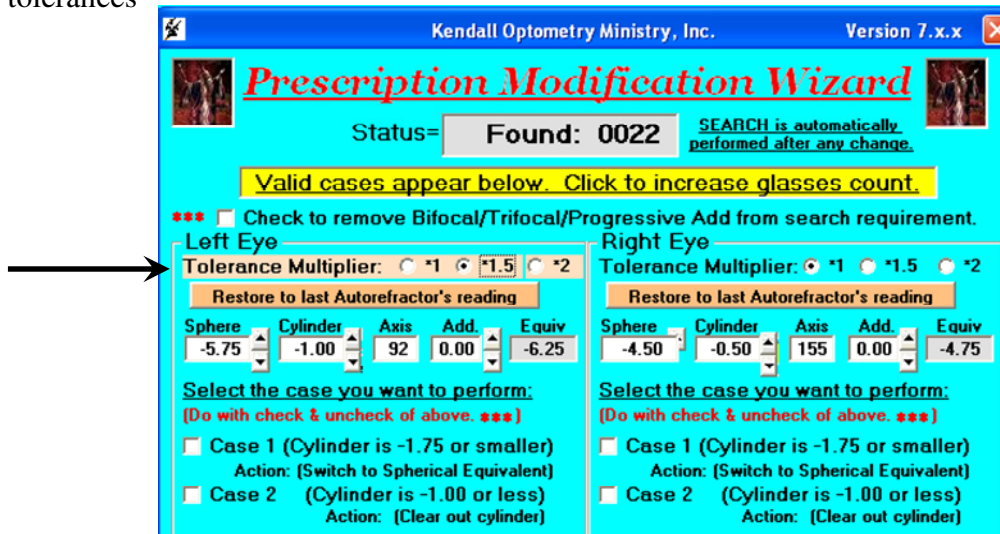
Below is a copy of the Wizard screen. The wizard assists the operator in modifying the prescription in a way which will allow one to find a pair of glasses which will at least help the patient even though it might not be an exact match for the prescription. The tolerance multipliers for the left and right eyes are circled.



As you can see, 13 glasses were found with this prescription. The default setting on Glasses Inventory in this case is showing below.



This setting allows glasses to appear on the list when their Sphere and Cylinder are within 1 diopter and their axis are within 15 degrees. This applies equally to both the left and the right eye. However if you change the left tolerance setting by clicking the *1.5 (times 1.5), you will see the below. This means that the Sphere and Cylinder tolerance on the left eye only is 1.5 diopters and the axis is $1.5 * 15 = 22.5$ degrees. The right eye tolerance hasn't changed. With this change you are still matching the right eye with very close tolerances



2.3 Load Previous Autorefractor Measurements.

Every time an autorefractor measurement is made, a record is created in a file called **AutorefractorReadings.txt** containing this information:

Patient Nr, Right Sphere, Cylinder, Axis, Left Sphere, Cylinder, Axis, Measurement Date, Time.
 If sometime later one wants to see the list of autorefractor readings, they can do:

File | Load Previous Autorefractor Measurements

as shown below.



And a scrollable window like the below will appear.

Autorefractor Readings. Version 7.x.x

Click on a line below to restore this reading into the autorefractor measurements fields in the main menu.

Person Number	Age	Right			Left			Date	Time
		Sphere	Cylinder	Axis	Sphere	Cylinder	Axis		
00101	21	3.75	-1.50	121	2.75	-0.50	105	8/31/2010	3:04:24PM
00102	23	-4.50	-0.50	155	-5.75	-1.00	92	8/31/2010	3:10:22PM
00103	47	-4.50	-1.25	169	-4.50	-0.25	162	8/31/2010	3:15:33PM
00104	53	-4.00	-1.50	159	-4.00	-1.25	50	8/31/2010	3:16:00PM
00105	51	-6.50	-1.25	168	-4.50	-1.00	172	8/31/2010	4:51:49PM
00106	65	0.25	-5.75	14	-1.50	-1.00	99	8/31/2010	4:52:01PM
00107	18	-5.25	0.00	0	-4.25	-0.50	90	8/31/2010	4:52:12PM
99191	10	-5.00	-0.50	15	-3.75	-1.00	144	8/31/2010	4:52:28PM
99192	43	3.75	-0.50	62	3.25	-0.25	18	8/31/2010	4:52:37PM
99193	24	1.00	0.00	0	1.00	-0.25	98	8/31/2010	4:52:45PM
99194	38	1.25	-0.50	109	1.00	-0.50	86	8/31/2010	4:52:54PM
99195	33	-0.25	-0.50	3	-0.25	-0.50	176	8/31/2010	4:53:04PM
99196	27	-3.75	-0.50	4	-2.50	0.00	0	8/31/2010	4:53:13PM
99197	21	-0.50	-0.25	147	-1.00	0.00	0	8/31/2010	4:53:21PM
99198	20	-3.00	-0.25	35	-3.00	0.00	0	8/31/2010	4:53:30PM
99199	18	-1.50	-0.50	95	-1.25	-0.25	104	8/31/2010	4:53:38PM
99200	28	-1.75	-1.00	96	-2.75	-1.00	86	8/31/2010	4:53:48PM
99201	24	-1.25	-0.25	176	-2.75	-0.25	113	8/31/2010	4:53:55PM
99202	68	0.50	-2.50	89	0.50	-2.75	96	8/31/2010	4:54:04PM

Exit

If you would like to reenter patient 107, then click the line beginning with 107 and the following will appear in the main window. Notice how the patient number, age and prescription have been entered. Click EXIT on the above window to use the main window.

The screenshot shows the 'Glasses Selection and Inventory Control' main window. The 'Data Entry Area' is active for patient 00107, age 18. The 'Left' and 'Right' eye prescription fields are populated with values from the previous window. The 'Autorefractor Bypass' checkbox is checked. The 'Items Available' list on the right shows search results for patient 107, with the first entry selected. The status bar at the bottom indicates 'Found: 0006'.

There are several benefits to this feature.

- 1) You produce a list of glasses for a patient and nothing on the list works. Perhaps the patient doesn't like any of the glasses identified. You would like to produce a new list without having to re-measure the patient.
- 2) You would like to reload prescriptions into the program to practice using the wizard to find an increased number of matches.
- 3) You return from your trip and would like to know what prescriptions you measured for the patients. Perhaps you want to see if most of the patients were near sighted. Perhaps many of them had a lot of astigmatism. From this analysis you might decide to bring more near sighted glasses on your next trip.

2.4 Other Invisible changes

Several bugs were discovered and fixed. These changes increased the number of valid glasses listed in the search window.

The sort order was changed to allow the axis to have a greater affect on the "closeness of fit" or "margin" based upon the magnitude of the cylinder. The larger the cylinder, the greater the affect the axis difference will have on the margin. The smaller the Cylinder, the axis difference will have a smaller affect on the margin.

You can see the margin column identified with a "#" at the top in the below graphic from the search window of the main Glasses Inventory screen as you can see below. This is when searching for Left Eye: -4.25 -0.50 90 and Right eye: -5.25 0.00 0

No Check = Turn on Equivalent. Check= Turn on Match										Match Net/Add Power					
Left		Right		G		Flag		G		Flag					
#	Nr.	SPH	CYL	Axis	Add (Pwr)	PD	Rej#	Flag	SPH	CYL	Axis	Add (Pwr)	(S R P B)	G	Flag
0.5	1917	-4.50	0.00	000	0.00(-4.50)	M	0	-Match	-5.25	0.00	000	0.00(-5.25)	(xxxx)	F	-Match
0.6	2107	-4.75	-0.25	072	0.00(-4.88)	M	0	-Match	-5.00	0.00	000	0.00(-5.00)	(xxxx)	F	-Match
0.8	3446	-4.00	-0.25	130	0.00(-4.13)	M	0	-Match	-4.50	0.00	000	0.00(-4.50)	(xxxx)	E	-Match
1.0	0257	-3.75	-0.25	046	0.00(-3.88)	M	0	-Match	-4.50	0.00	000	0.00(-4.50)	(xxxx)	F	-Match
1.1	2813	-4.75	0.00	000	0.00(-4.75)	M	0	-Match	-4.50	0.00	000	0.00(-4.50)	(xxxx)	C	-Match
1.1	3957	-4.75	-0.25	151	0.00(-4.88)	M	0	-Match	-4.25	0.00	000	0.00(-4.25)	(xxxx)	F	-Match

