

# ==== Shimadzu LabSolutions Analysis Report =====

Sample Name : PH\_NT\_131025\_15%Gly\_0  
 Sample ID :  
 Data Filename : PH\_NT\_131025\_15%Gly\_0\_110825I\_20wt%\_180\_SFB\_B\_ST1\_0.8 mL\_45 min\_Start\_0  
 Method Filename : SFB\_B\_ST1\_0.8 mL\_45 min\_Start.lcm  
 Batch Filename : 110825I\_20wt%\_180.lcb  
 Vial # : 1-1 Sample Type : Unknown  
 Injection Volume : 10 uL  
 Date Acquired : 10/13/2025 1:28:51 PM Acquired by : System Administrator  
 Date Processed : 10/13/2025 2:13:52 PM Processed by : System Administrator

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## <Method>

### <<Header>>

Generated : 4/24/2024 3:47:23 PM  
 GeneratedBy : System Administrator  
 Modified : 10/13/2025 9:34:15 AM  
 ModifiedBy : System Administrator

### <<System Controller>>

Model : SCL-40  
 Event1 : Off  
 Event2 : Off  
 Sample Load Timing : Off

### <<Data Acquisition>>

LC Stop Time : 45.00 min  
 Detector A Name : Detector A  
 Detector A Sampling Frequency : 2 Hz  
 Detector A Start Time : 0.00 min  
 Detector A End Time : 45.00 min

### <<Pump>>

Mode : Isocratic flow  
 Pump A : LC-40D  
 Pump A Flow/Pressure : Flow  
 Pump System A Flow : 0.8000 mL/min  
 Pump System A Flow Slope : 20.00 min  
 Pump A PressMax : 90 bar  
 Pump A PressMin : 0 bar  
 Pump A Valve Model : Switching Valve  
 Pump A Valve : B  
 Pump A Compressibility Setting : On  
 Pump A Mobile Phase Settings : 0.45 /GPa

### <<Autosampler>>

Autosampler Model : SIL-40  
 Enable Autosampler : Use  
 Rinse Type : External only  
 Specify Plate : Off  
 Rinsing Volume : 500 uL  
 Cut Off Loop : Off  
 Specify Needle Stroke : Off  
 Rinsing Speed : 35 uL/sec  
 Sampling Speed : 5.0 uL/sec  
 Rinse Port R0 Purge Time : 2.0 min  
 Measuring Line Purge Time : 5.0 min  
 Rinse Mode : Before and after aspiration  
 Rinse Dip Time : 0 sec  
 Measuring Line Purge Volume : 100 uL  
 Air Gap Volume : Off  
 Rinse Port Liquid : R0

### <<Sample Pretreatment>>

Mode : Standard

### <<Oven>>

Oven Model : CTO-40C  
 Enable Oven : Use  
 Oven Temperature : 25 C  
 Maximum Temperature : 105 C

|                    |            |
|--------------------|------------|
| Ready Check        | : On       |
| Wait Time          | : 5 min    |
| Ready Range        | : 1.0 C    |
| Fan Speed          | : Auto     |
| Cooler Mode        | : Auto     |
| Valve 1/L          | : FCV-0206 |
| Valve 1/L Position | : 1        |

&lt;&lt;Detector A&gt;&gt;

|                            |                  |
|----------------------------|------------------|
| Model                      | : RID-20A        |
| Mode                       | : Analytical     |
| Polarity                   | : +              |
| Use Cell Temp.             | : Use            |
| Cell Temp.                 | : 40.0 C         |
| Response                   | : 1.5 sec        |
| Intensity Unit             | : Volt           |
| Auxiliary Range            | : 1.0E-3 RIU/V   |
| Recorder Range             | : 100.00 uRIU/FS |
| Synchronize with Auxiliary | : Off            |
| Purge Time                 | : 20 min         |

## <<LC Time Program>>

| Time  | Module         | Command | Value | Comment |
|-------|----------------|---------|-------|---------|
| 0.01  | RID-20A(DET.A) | Zero    |       |         |
| 45.00 | Controller     | Stop    |       |         |

## <<Peak Integration>>

<Detector A>

```

Channel                      : Ch1
Width                       : 5 sec
Slope                       : 2000 uV/min
Drift                       : 0 uV/min
T.DBL                       : 1000 min
Max Slices                  : 0
Peak Top Detection          : Normal
RT Compensation Mode        : Fine
Min.Area/Height is made effective in Manual Integration      : Off
Min.Area/Height             : 1000 counts
Calculated by               : Area
Noise Calculation Settings  : Noise Data                  : Current Data
                             : Calculation Method          : ASTM
                             : Range                      : Whole Range
                             : Interval                   : 0.5 min
                             : Include the Peak Detected Range : Off
                             : Detection Limit Coefficient : 3.3
                             : Quantitative Limit Coefficient : 10.0
Drift Calculation Settings   : 0.000 - 15.000 min

```

&lt;&lt;Integration Time Program(Method)&gt;&gt;

<Detector A>

Channel : Ch1  
Time Program : None

&lt;&lt;Integration Time Program(Data)&gt;&gt;

<Detector A>

Channel : Ch1  
Time Program : None

<<Identification>>

<Detector A>

|                              |                |
|------------------------------|----------------|
| Window/Band                  | : Window       |
| Window                       | : 5.00 %       |
| Identification Method        | : Absolute     |
| Peak Selection               | : Closest Peak |
| Display not identified peaks | : Not display  |

<<Quantitative>>

<Detector A>

|                         |                     |
|-------------------------|---------------------|
| Quantitative Method     | : External Standard |
| Calculated by           | : Area              |
| # of Calibration Levels | : 14                |
| Curve Fit Type          | : Linear            |
| Zero                    | : Not Forced        |
| Weighting Method        | : None              |
| X Axis of Calib. Curve  | : Conc.             |
| Units                   | : mol/L             |
| Format of Conc.         | : Decimals          |
| Format of Conc. Figure  | : 5                 |
| Group Type              | : Not Used          |

Check %Dev(Standard) : No  
 Check Accuracy[%](Standard) : No  
 Check %Dev(Control) : No  
 Check Accuracy[%](Control) : No  
 Check %Dev(Additive) : No  
 Check Accuracy[%](Additive) : No  
 Check %Dev(Unknown) : No  
 Check Accuracy[%](Unknown) : No  
 Check Quantitation Limit : No  
 Check Detect Limit : No

## &lt;&lt;Compound Table&gt;&gt;

## &lt;Detector A&gt;

ID# : 1  
 Name : Methanol  
 Type : Target  
 Channel : Ch1  
 Retention Time : 14.400 min  
 Retention Index : 0  
 Concentration : [1]=3.016738 [2]=1.049395 [3]=0.4943277  
                   [4]=0.2893701 [5]=0.1127578 [6]=0.06136267  
                   [7]=0.01619725 [8]=3.016738 [9]=1.049395  
                   [10]=0.4943277 [11]=0.2893701 [12]=0.1127578  
                   [13]=0.06136267 [14]=0.01619725  
 Peak Selection : Default(Closest Peak)  
 Calculated by : Default(Area)  
 Curve Fit Type : Default(Linear)  
 Zero : Default(Not Forced)  
 Weight : Default(None)  
 Window/Band : Default(Window)  
 Spiked : 0.000  
 1st Coefficient : 4.720087e+005  
 Intersection : 1.693726e+003  
 Correction Factor : 1.000000  
 Standard concentration factor : 1.000000

ID# : 2  
 Name : Glycerin  
 Type : Target  
 Channel : Ch1  
 Retention Time : 10.000 min  
 Retention Index : 0  
 Concentration : [1]=2.958375 [2]=1.078646 [3]=0.5353454  
                   [4]=0.3066948 [5]=0.114594 [6]=0.05901699  
                   [7]=0.0117174 [8]=2.958375 [9]=1.078646  
                   [10]=0.5353454 [11]=0.3066948 [12]=0.114594  
                   [13]=0.05901699 [14]=0.0117174  
 Peak Selection : Default(Closest Peak)  
 Calculated by : Default(Area)  
 Curve Fit Type : Default(Linear)  
 Zero : Default(Not Forced)  
 Weight : Default(None)  
 Window/Band : Default(Window)  
 Spiked : 0.000  
 1st Coefficient : 7.326784e+006  
 Intersection : 2.573900e+005  
 Correction Factor : 1.000000  
 Standard concentration factor : 1.000000

ID# : 3  
 Name : n-Propanol  
 Type : Target  
 Channel : Ch1  
 Retention Time : 20.000 min  
 Retention Index : 0  
 Concentration : [1]=3.02526 [2]=1.092217 [3]=0.5139845  
                   [4]=0.3105323 [5]=0.09785473 [6]=0.04497364  
                   [7]=0.01087275 [8]=3.02526 [9]=1.092217  
                   [10]=0.5139845 [11]=0.3105323 [12]=0.09785473  
                   [13]=0.04497364 [14]=0.01087275  
 Peak Selection : Default(Closest Peak)  
 Calculated by : Default(Area)  
 Curve Fit Type : Default(Linear)  
 Zero : Default(Not Forced)  
 Weight : Default(None)  
 Window/Band : Default(Window)  
 Spiked : 0.000  
 1st Coefficient : 3.955755e+006  
 Intersection : -2.585461e+004

Correction Factor : 1.000000  
Standard concentration factor : 1.000000

ID# : 4  
Name : 1,2 Propandiol  
Type : Target  
Channel : Ch1  
Retention Time : 12.400 min  
Retention Index : 0  
Concentration : [1]=2.977546 [2]=1.016412 [3]=0.5030017  
[4]=0.3027638 [5]=0.1023958 [6]=0.04970167  
[7]=0.01157971 [8]=2.977546 [9]=1.016412  
[10]=0.5030017 [11]=0.3027638 [12]=0.1023958  
[13]=0.04970167 [14]=0.01157971

Peak Selection : Default(Closest Peak)  
Calculated by : Default(Area)  
Curve Fit Type : Default(Linear)  
Zero : Default(Not Forced)  
Weight : Default(None)  
Window/Band : Default(Window)  
Spiked : 0.000  
1st Coefficient : 5.771075e+006  
Intersection : 6.007717e+004  
Correction Factor : 1.000000  
Standard concentration factor : 1.000000

ID# : 5  
Name : 1,3 Propandiol  
Type : Target  
Channel : Ch1  
Retention Time : 13.000 min  
Retention Index : 0  
Concentration : [1]=2.976375 [2]=0.9968958 [3]=0.4990984  
[4]=0.2900131 [5]=0.10734 [6]=0.04944145  
[7]=0.0100184 [8]=2.976375 [9]=0.9968958  
[10]=0.4990984 [11]=0.2900131 [12]=0.10734  
[13]=0.04944145 [14]=0.0100184

Peak Selection : Default(Closest Peak)  
Calculated by : Default(Area)  
Curve Fit Type : Default(Linear)  
Zero : Default(Not Forced)  
Weight : Default(None)  
Window/Band : Default(Window)  
Spiked : 0.000  
1st Coefficient : 5.532080e+006  
Intersection : 6.014722e+004  
Correction Factor : 1.000000  
Standard concentration factor : 1.000000

ID# : 6  
Name : iso-Propanol  
Type : Target  
Channel : Ch1  
Retention Time : 16.825 min  
Retention Index : 0  
Concentration : [1]=3.03666 [2]=1.003405 [3]=0.5418687  
[4]=0.3101858 [5]=0.1067771 [6]=0.04972951  
[7]=0.01397083 [8]=3.03666 [9]=1.003405  
[10]=0.5418687 [11]=0.3101858 [12]=0.1067771  
[13]=0.04972951 [14]=0.01397083

Peak Selection : Default(Closest Peak)  
Calculated by : Default(Area)  
Curve Fit Type : Default(Linear)  
Zero : Default(Not Forced)  
Weight : Default(None)  
Window/Band : Default(Window)  
Spiked : 0.000  
1st Coefficient : 3.797216e+006  
Intersection : -2.284739e+004  
Correction Factor : 1.000000  
Standard concentration factor : 1.000000

ID# : 7  
Name : Hydroxyacetone  
Type : Target  
Channel : Ch1  
Retention Time : 13.300 min  
Retention Index : 0  
Concentration : [1]=2.855514 [2]=0.9609004 [3]=0.4875675

|  |                 |                  |                |
|--|-----------------|------------------|----------------|
|  | [4]=0.3072624   | [5]=0.1038742    | [6]=0.04860286 |
|  | [7]=0.009361501 | [8]=2.855514     | [9]=0.9609004  |
|  | [10]=0.4875675  | [11]=0.3072624   | [12]=0.1038742 |
|  | [13]=0.04860286 | [14]=0.009361501 |                |

Peak Selection : Default(Closest Peak)  
 Calculated by : Default(Area)  
 Curve Fit Type : Default(Linear)  
 Zero : Default(Not Forced)  
 Weight : Default(None)  
 Window/Band : Default(Window)  
 Spiked : 0.000  
 1st Coefficient : 4.865699e+006  
 Intersection : 5.855022e+004  
 Correction Factor : 1.000000  
 Standard concentration factor : 1.000000

ID# : 8  
 Name : Ethylenglykol  
 Type : Target  
 Channel : Ch1  
 Retention Time : 12.200 min  
 Retention Index : 0  
 Concentration : [1]=2.933794 [2]=1.030353 [3]=0.4898163  
                   [4]=0.3033639 [5]=0.09840986 [6]=0.059971  
                   [7]=0.01068632 [8]=2.933794 [9]=1.030353  
                   [10]=0.4898163 [11]=0.3033639 [12]=0.09840986  
                   [13]=0.059971 [14]=0.01068632

Peak Selection : Default(Closest Peak)  
 Calculated by : Default(Area)  
 Curve Fit Type : Default(Linear)  
 Zero : Default(Not Forced)  
 Weight : Default(None)  
 Window/Band : Default(Window)  
 Spiked : 0.000  
 1st Coefficient : 4.284813e+006  
 Intersection : 4.449721e+003  
 Correction Factor : 1.000000  
 Standard concentration factor : 1.000000

ID# : 9  
 Name : Ethanol  
 Type : Target  
 Channel : Ch1  
 Retention Time : 16.000 min  
 Retention Index : 0  
 Concentration : [1]=3.010594 [2]=1.02339 [3]=0.5257763  
                   [4]=0.2939754 [5]=0.0961865 [6]=0.04960971  
                   [7]=0.01299818 [8]=3.010594 [9]=1.02339  
                   [10]=0.5257763 [11]=0.2939754 [12]=0.0961865  
                   [13]=0.04960971 [14]=0.01299818

Peak Selection : Default(Closest Peak)  
 Calculated by : Default(Area)  
 Curve Fit Type : Default(Linear)  
 Zero : Default(Not Forced)  
 Weight : Default(None)  
 Window/Band : Default(Window)  
 Spiked : 0.000  
 1st Coefficient : 2.109543e+006  
 Intersection : -9.590194e+003  
 Correction Factor : 1.000000  
 Standard concentration factor : 1.000000

ID# : 10  
 Name : Propionsäure  
 Type : Target  
 Channel : Ch1  
 Retention Time : 13.600 min  
 Retention Index : 0  
 Concentration : [1]=2.962704 [2]=0.9915078 [3]=0.5019324  
                   [4]=0.3085198 [5]=0.1036906 [6]=0.04835313  
                   [7]=0.01168534 [8]=2.962704 [9]=0.9915078  
                   [10]=0.5019324 [11]=0.3085198 [12]=0.1036906  
                   [13]=0.04835313 [14]=0.01168534

Peak Selection : Default(Closest Peak)  
 Calculated by : Default(Area)  
 Curve Fit Type : Default(Linear)  
 Zero : Default(Not Forced)  
 Weight : Default(None)  
 Window/Band : Default(Window)

Spiked : 0.000  
 1st Coefficient : 4.601450e+006  
 Intersection : -1.609005e+003  
 Correction Factor : 1.000000  
 Standard concentration factor : 1.000000

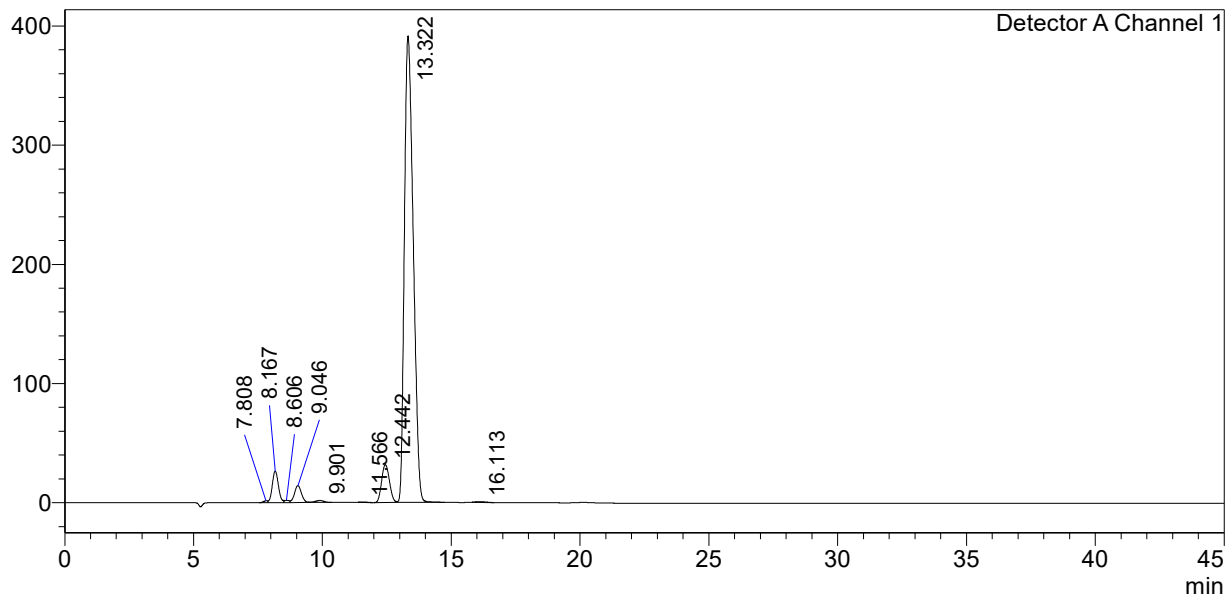
## &lt;&lt;Column Performance&gt;&gt;

## &lt;Detector A&gt;

Calculation Method : USP  
 Unretained Peak Time : Time at 1st Peak  
 Column Length : 150 mm  
 Calculate Identified Peaks Only : Off  
 Calculation of Relative Retention Time : Off

## &lt;Chromatogram&gt;

mV



## &lt;Peak Table&gt;

Detector A Channel 1

| Peak# | Ret. Time | Area     | Height | Conc.  | Unit  | Mark | Name           |
|-------|-----------|----------|--------|--------|-------|------|----------------|
| 1     | 7.808     | 17772    | 1565   | 0.000  |       |      |                |
| 2     | 8.167     | 433704   | 26363  | 0.000  |       | V    |                |
| 3     | 8.606     | 25733    | 1960   | 0.000  |       | V    |                |
| 4     | 9.046     | 268249   | 14224  | 0.000  |       | V    |                |
| 5     | 9.901     | 39317    | 1671   | -0.030 | mol/L | V    | Glycerin       |
| 6     | 11.566    | 5948     | 359    | 0.000  |       |      |                |
| 7     | 12.442    | 670309   | 31725  | 0.106  | mol/L |      | 1,2 Propandiol |
| 8     | 13.322    | 9387533  | 391222 | 1.917  | mol/L | V    | Hydroxyacetone |
| 9     | 16.113    | 16142    | 641    | 0.012  | mol/L |      | Ethanol        |
| Total |           | 10864707 | 469731 |        |       |      |                |