Financial Calculations and Formulas

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Dealership
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Class #

Service Department Sales And Gr

Category	Sales
Customer Pay	$ 222,648
Customer	
Customer Other	
Warranty	$ 134,662
Warranty (ToyotaCare)	$ 83,796
Internal	$ 40,301
NVI / Road Ready/ PDI	$ 49,035
Adj. Cost Of Labor	
Total	$ 530,442

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Customer Pay Gross Profit %

Total Service Dept. G.P. %

oss (Labor Only)

Gross	Gross as % of Sales	%Sales Contribution
$ 163,595	73.48%	41.97%
	0%	0.00%
	0%	0.00%
$ 102,832	76.36%	25.39%
$ 73,984	88.29%	15.80%
$ 26,496	65.75%	7.60%
$ 36,776	75.00%	9.24%
$ (250)	0%	0.00%
$ 403,433	76.06%	100.00%

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73.48%
76.06%

Parts To Labor Ratios

Category	Parts Sales	Labor Sales	P/L Ratio
Customer Pay	$ 257,224	$ 222,648	1.16
Customer		$ -	0.00
Customer Other		$ -	0.00
Warranty	$ 197,294	$ 134,662	1.47
Warranty Other	$ 13,660	$ 83,796	0.16
Internal	$ 41,544	$ 40,301	1.03
Total	$ 509,722	$ 481,407	1.06

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Customer Pay Gross Profit %	73.48%
Total Service Dept. G.P. %	76.06%
Parts / Labor Ratio (Cust. Pay Only)	1.16

Service Department Profit Centering

Expense Category	Dollar Amount	% of Gross	Profile
Department Gross	$ 403,433		
Variable Expense	$ 53,457	13.25%	
Selling Expense	$ 100,010	24.79%	
Personnel Expense		0.00%	
Semi-Fixed Expense	$ 204,335	50.65%	
Fixed Expense		0.00%	
Unallocated Expense		0.00%	
Dealer's Salary		0.00%	
Total Expenses	$ 357,802	88.69%	
Net Profit	$ 45,631	11.31%	

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The Picture	
Customer Pay Gross Profit %	73.48%
Total Service Dept. G.P. %	76.06%
Parts / Labor Ratio (Cust. Pay Only)	1.16
Total Service Dept. Expenses	$ 357,802

Fixed Absorption

		% Adj Ovh
Parts Department Total Gross	$ 319,106	12.15%
Service Department Total Gross	$ 409,243	15.58%
Body Shop Department Total Gross	$ 84,199	3.21%
Total Fixed Gross Profit	$ 812,548	
Total Dealership Expense	$ 2,626,579	

Overhead Expense	$ 2,626,579	
Total Fixed Gross Profit	$ 812,548	
Total Dealership Expense	$ 2,626,579	
Fixed Absorption Percentage	30.94%	**Guideline**

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Customer Pay Gross Profit %	73.48%
Total Service Dept. G.P. %	76.06%
Parts / Labor Ratio (Cust. Pay Only)	1.16
Total Service Dept. Expenses	$ 357,802


d Exp
60%

NADA ACTUAL SERVICE ANALYSIS

	Labor Sales / Month		Effective Labor Rates	
Customer Pay	$ 222,648	÷	101.00	=
Customer	$ -	÷		=
Customer Other	$ -	÷		=
Warranty	$ 218,458	÷	114.73	=
Internal	$ 40,301	÷	95.00	=
New Vehicle Prep	$ 49,035	÷	114.73	=
Total	$ 530,442			

POTENTIAL

$ 530,442	÷	4960.16	=	
Total labor sales for month		Total hours billed		
19.00	x	8	x	
# Service mechanical technicians		# Hours/Day		
4,104.0	x	$ 106.94	=	
Hours Available to Sell		Effective Labor Rate		

How proficient are your technicians ?

4,960.2	÷	4,104.00	=
Total Hours Billed		Hours Available to Sell	

Hours Per RO (RO Analysis)	0.8
Percent of One Item R.O.'s (RO Analysis)	64.00%
Customer Pay Effective Labor Rate (DMS Reoprt)	$ 101.00
Warranty Labor Rate (DMS Report)	$ 114.73
Total Overall Effective Labor Rate	$ 106.94
Overall Technician Proficiency	120.86%

Hours Billed
2204.4
0.00
0.00
1904.1
424.2
427.4
4960.2

$ 106.94
Effective Labor Rate

27 = 4,104.0
Working Days/Month — Hours Available to Sell

$ 438,884 — Labor sales potential @100%

$ 548,605.14 — Labor sales potential @ 125%

120.86%
Tech Proficiency

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FACILITY POTENTIAL

Number of Bays	42	
	x	
Number of Days	27	
	x	
Number of Hours	12	
	x	
Effective Labor Rate	$ 106.94	
	equals	
FACILITY POTENTIAL		$ 1,455,247

FACILITY UTILIZATION

Total Labor Sales	$ 530,442	
	÷	
Facility Potential	$ 1,455,247	
	equals	
FACILITY UTILIZATION		36.45%

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Calculating Real Cost of Labor

$ 530,442	Labor Sales
4,960.2	Divided by Hours Billed
$ 106.94	= OELR

$ 127,009	Labor Cost
4,960.20	/ Hours Billed
$ 25.61	=Real Cost

$25.61	÷	24.00%	=	
Real Cost				

$ 530,442
Labor Sales

$ 403,433
-Labor Gross

$ 127,009
=Labor Cost

$106.71
E.L.R. Needed to earn

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OWNER BASE POTENTIAL

20640	x	8	=	165,120.0
5 Year Owner Base		Annual Hours Purchased		Market Potential / Hours
165,120.0	x	$ 106.94	=	$ 17,657,873
Market Potentail/ Hours		Effective Labor Rate		5 Yr. O.B Sales Potential
$ 551,041	x	12	=	$ 6,612,495
Avg. Mos. Labor Sales		Annualized		Current Labor Sales Trend
$ 6,612,495	÷	$ 17,657,873	=	37.45%
Labor Sales Trend		5 Yr. O.B. Sales Potential		Ouch

**Note: The industry average of 35% is very poor performance.*

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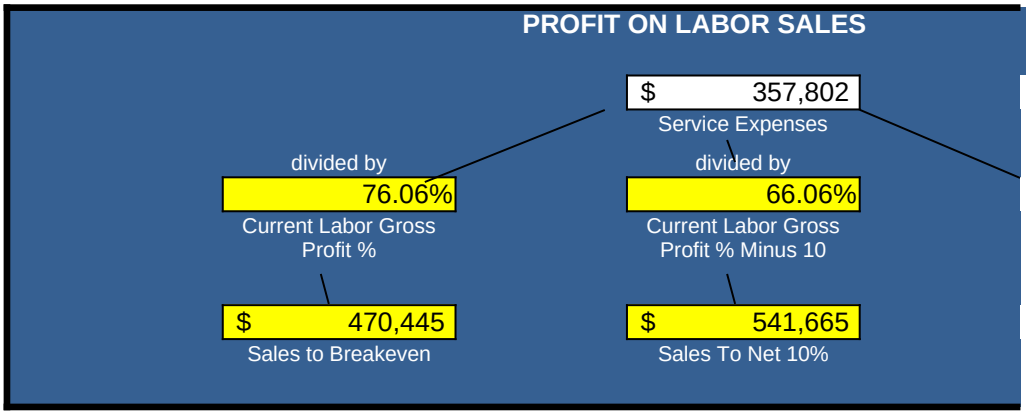

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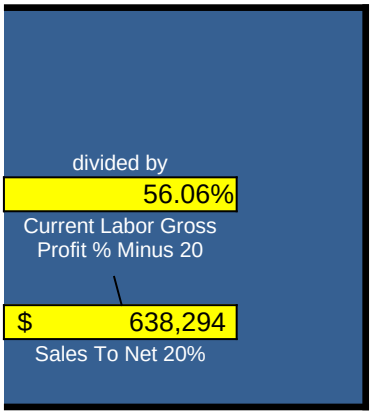
Customer Pay Gross Profit %	73.48%	Customer Pay
Total Service Dept. G.P.%	76.06%	Total (overall)
Parts / Labor Ratio (Cust Pay Only)	1.16	Warranty Labo
Total Service Dept Expense	$ 357,802	Overall Tech Pı
Hours Per R.O (recap)	0.76	
Percent Of One Item R.O.'s	64.00%	



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E.L.R.	$ 101.00
E.L.R.	$ 106.94
ır Rate	$ 114.73
roficiency	120.86%

Technician Value

Calculate using daily available hours per technician

Hours		Days	
8	x	27	x

Sales Value		Gross Margin	
$ 23,099	x	76.06%	=

$ 17,568	x	70%		$ 12,298
$ 17,568	x	80%		$ 14,055
$ 17,568	x	90%	proficiency	$ 15,811
$ 17,568	x	100%		$ 17,568
$ 17,568	x	110%		$ 19,325
$ 17,568	x	120%		$ 21,082
$ 17,568	x	120.9%	=	$ 21,233
Profit Value		**Your Proficiency #**		Adjusted Profit Val

Labor Rate		Sales Value
$ 106.94	=	$ 23,099

Profit Value

$ 17,568

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STAFFING REQUIREMENTS

A. Sales To Break Even

Service Expenses for One Month		Current Gross Profit Percent	
$ 357,802	¸	76.06%	=

B. Sales To Generate 20% Net

Service Expenses for One Month		Current Gross Profit Percent (Minus 20)	
$ 357,802	¸	56.06%	=

C. Technician Value

Daily Work Hours		Average Proficiency Rate		Overall Effective Labor Rate	
8	X	80%	X	$ 106.94	X
8		90%		$ 106.94	
8		100%		$ 106.94	
8		120%		$ 106.94	

D. Staffing To Break Even

Sales To Break Even		Technician Value

$	470,445	18,479	@ 80%
$	470,445	20,789	@ 90%
$	470,445	23,099	@ 100%
$	470,445	27,719	@ 120%

E. Staffing To Generate 20% Net

Sales To Generate 20% Net		Technician Value	
$	638,294	$ 18,479	@ 80%
$	638,294	$ 20,789	@ 90%
$	638,294	$ 23,099	@ 100%
$	638,294	$ 27,719	@ 120%

Sales To Break Even

$ 470,445

Sales To Generate 20% Net

$ 638,294

Work Days Per Month	=	Technician Value
27		$18,479
27		$20,789
27		$23,099
27		$27,719

= Staffing

=	25.5	
=	22.6	
=	20.4	
=	17.0	
=	Staffing	
=	34.5	
=	30.7	
=	27.6	
=	23.0	

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How To Set Advisor Sales Objectives To: Beak Even, N

Break Even

1	Service Department's Monthly Expenses	$357,802
2	Divide by current labor gross profit % to break even	76.06%
3	Equals New Sales Objective	$ 470,445
4	Number of Advisors	11.0
5	Equals Sales Objective per Advisor	$ 42,768
6	Number of work days per month	27
7	Equals daily sales objective per advisor	$ 1,584
8	Current overall effective labor rate	$ 106.94
9	Equals daily sales objective per advisor (FRH's)	14.8

Service Advisor Performance

let 10%, & Net 20%

Net 10 %

1 Service Department's Monthly Expenses		$357,802
	÷	
2 Divide by current labor gross profit % minus 10 to net 10%		66.06%
	=	
3 Equals New Sales Objective		$ 541,665
	÷	
4 Number of Advisors		11.0
	=	
5 Equals Sales Objective per Advisor		$ 49,242
	÷	
6 Number of work days per month		27
	=	
7 Equals daily sales objective per advisor		$ 1,824
	÷	
8 Current overall effective labor rate		$ 106.94
	=	
9 Equals daily sales objective per advisor (FRH's)		17.1

Net 20 %

1	Service Department's Monthly Expenses		$357,802
2	Divide by current labor gross profit % minus 20 to net 20%	÷	56.06%
3	Equals New Sales Objective	=	$ 638,294
4	Number of Advisors	÷	11.0
5	Equals Sales Objective per Advisor	=	$ 58,027
6	Number of work days per month	÷	27
7	Equals daily sales objective per advisor	=	$ 2,149
8	Current overall effective labor rate	÷	$ 106.94
9	Equals daily sales objective per advisor (FRH's)	=	20.1

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Exercise to See What Happens When You Increase Your Hours Per Repair Order

Number of customer R.O.'s for the month			1877
	x		
Multiply by .3 hours			0.3 hours
Additional customer labor hours generated	=		563.10
	x		
Multiply by Customer Labor Rate			$ 101.00
Equals additional Customer Labor Sales Generated	=		$ 56,873
	x		
Multiply by customer Labor Gross Profit %			73.48%
Equals additional Labor Gross Profit $ generated	=	(A)	$ 41,789
Divide Parts Sales R.O. by Labor Sales R.O. to calculate $ parts sales per 1$ of Labor Sales	=		1.16
	x		
Multiply by Customer Labor Sales			$ 56,873
	=		

Equals additional Customer Parts Sales generated			$ 65,705
Multiply by Customer Parts Sales Gross Profit %	x		38.65%
Equals additional Parts Gross Profit $ Generated	=	(B)	$ 25,395
Add Gross Profit from Labor (A) and Parts (B)	=		$ 67,184

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Labor Rate Calcul

1 Calculate the **Labor Rate** for the following operation.

A/C Charge and Check

Labor Price	$144.00
Units	1.2

_____ ¸ _____ =
Price Units

2 Calculate the **Effective Labor Rate** for the following "R

Labor Operations	Labor Price
Clean Fuel Injectors	$ 117.60
R&R Rear Hub Bearing.	$ 96.00
Replace Trans. Pan gasket	$ 107.80
R&R Headlight unit (1)	$ 108.00

_____ ¸
Total Price

ations

$0.00
Labor Rate

epair" operations.

Labor Units		Labor Rate
1.20	=	
0.80	=	
1.10	=	
0.90	=	
	=	$0.00
Total Units		Effective Labor Rate (For This R.O.)

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Calculating Mark-Up

3 Using the following formula, mark-up a part costing $6.72 to gross profit (round to the nearest cent)

100%	⇨		=	
100%		Desired Gross Profit percent		
	X	0.00	=	
Part Cost		Mark-Up Factor		

4 Calculate the "Weighted Average" price at a 40% Gross Profit f parts (round to the nearest cent)

Item	Cost		Annual Turnover		
Filter #1	$4.36	X	112	=	
Filter #2	$4.01	X	56	=	
Filter #3	$3.56	X	85	=	
Filter #4	$3.86	X	202	=	
Filter #5	$3.51	X	36	=	
		Total Items	491		Total Cost

$ -	, 491	=	$ -	
Total Cost	Total Items		Average **Cost**	
$ -	X	=	$ -	
Cost	Factor		Average **Price**	

ɔ attain a 35%

0.00

Mark-Up Factor

$0.00

Retail Price

or the following

Total Cost

.

$0.00

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Cost Of A Come-Back

Lost Customer Opportunity			
Average Hours per R.O.	X		
	=	0.0	
Effective Labor Rate	X	$ 106.94	
Lost Labor Sales	=	$ -	(A)
Service Department Gross Profit % (Excluding Sublet)	X	76.06%	
Lost Labor Gross	=	$ -	(B)
Lost Labor Sales		$ -	(A)
Parts / Labor Ratio	X	1.16	
	=	$ -	
Parts Dept Gross Profit % R.O.Sales	X		
Lost Parts Gross	=	$ -	(C)
Lost Labor Gross		$ -	(B)
Lost Parts Gross	+	$ -	(C)
Total Lost Gross	=	$ -	

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