

John M. Mayer, LLC

Business Plan

14 November, 2016

This is a living document, far from perfect, and I welcome all constructive comments and opinions, whether corrections of typographical errors, experienced critiques of numerical assumptions, or questioning of the fundamental principles. The ideas are meant to be a long-term guide for the future, so previous revisions will be retained for retrospect, but I intend that it will undergo continuous refinement and reshaping.

Mission:

Provide the highest quality of service (maintenance, diagnosis, and repair) to owners of Think City electric vehicles, Prius, and other Toyota/Lexus/Scion compact to mid-size vehicles at a reasonable price and with a completely transparent process.

Vision:

Grow and evolve only as much as possible while maintaining excellence.

Continue to do what I know how to do expertly while also devoting a fraction of time and energy to learning, innovating and risk-taking.

Values:

Work is a component of life that creates/gives/is quality/fulfillment.

Minimize the conflict of interest inherent in automotive service.

Specialize; develop expertise.

Be transparent.

Be fair.

Strive for excellence.

Innovate.

Create.

Challenge yourself.

Build and nurture relationships.

Be an active part of the community.

Don't let the perfect be the enemy of the good; if you wait until it's perfect, you may be waiting forever.

Plans are nothing. Planning is everything.

There is no substitute for understanding.

Executive Summary

John M. Mayer, LLC was established in June 2016 to provide service for Think City electric vehicles. Through an agreement with Green Drop Garage, services were performed at the Moreland shop location. The quantity of Think service was (and will continue to be) insufficient to employ a single full-time technician.

John M. Mayer, LLC will continue to provide services for Think, but is expanding to also offer specialized service for Toyota Prius and other subcompact to mid-sized Toyota/Lexus/Scion passenger vehicles. This transition will entail many major changes including a new shop location, increased expenses (especially the addition of rent and marketing), and increased sales.

The business will offer several unique selling propositions in order to attract and maintain a loyal client base. All financial information will be completely transparent and available for any interested party to scrutinize. Parts will be sold to customers at the price for which they were purchased with no mark-up. The entire shop space will be visible to the public in real time through a security camera system connected to the Internet. Car handling outside of the shop will be recorded using dash-mounted cameras. Limitation of work to a very narrow range of makes and models will guarantee expertise and minimize warranty repairs.

The purpose of this business plan is twofold:

Solicit loans to pay for start-up costs.

Solicit lease offers for shop locations.

Company Description and Service Line

Background

I worked as a technician at Hawthorne Auto Clinic for over 5 years. (My resume is attached for a complete overview of my education and work history.) During that time I specialized in work on hybrid and electric vehicles. Specifically (and especially in the last few years of my work at Hawthorne), I worked almost exclusively on Toyota Prius (simply because it is by far the most common hybrid on the market) and Think City electric vehicles. Think is a Norwegian manufacturer that sold around 400 vehicles in the US. With 125 or so of those cars being sold in the vicinity of Portland, Oregon and no dealership infrastructure, Think North America offered Hawthorne Auto Clinic the opportunity to become a warranty service center. I was the technician that performed all of the Think services. But when warranties ended, it was difficult for Hawthorne Auto Clinic to justify maintaining its inventory of Think parts in its small and densely utilized shop space, and I was also looking for a career path with greater upward mobility.

In June of 2016 I registered John M. Mayer, LLC with the State of Oregon and began servicing Think City electric vehicles as an independent contractor operating out of Green Drop Garage Moreland. Because there are so few Think cars that need service, I performed all of the Think work that was required as a part-time job while I finished a Associates of Applied Sciences degree in Computer Information Systems from Portland Community College. I also maintain a website with technical information to help Think owners that don't live near a service station, ship parts across the US and Europe, and perform mobile services for Think owners that live just beyond the single-charge-range of a Think (e.g. in Salem, Corvallis and Eugene). Over the course of about 4 months and at a rate of \$40/hr I created revenue of over \$5,500 in labor alone. I've decided to expand my business and have more control over operations by moving to a new shop location.

Present and Future

I intend to operate my business as a sole owner/member until I have had sufficient experience and have gained confidence that I will be able to provide a reliable payroll for employees. Limiting my sales to only the work that I can do alone

is not viable for the long term, so I anticipate hiring and training at least one employee within one year of opening a shop location.

The mission of John M. Mayer, LLC will be to:

Provide the highest quality of service (maintenance, diagnosis, and repair) to owners of Think City electric vehicles, Prius, and other Toyota/Lexus/Scion compact to mid-size vehicles at a reasonable price and with a completely transparent process.

The services offered will be dependent on acquisition of required shop equipment or leasing a facility where such equipment is available. For example, the ability to offer tire sales requires a tire mounting/dismounting machine and balancer. In order to offer alignments to customers, my location will need an alignment rack and instrumentation. A lift and an air compressor shall be the minimum shop equipment, and these tools will provide the capability to perform most mechanical and electrical diagnosis and repair.

John M. Mayer, LLC will depart from many established models of automotive repair businesses.

The emphasis on quality in the mission statement derives from the understanding that the value of automotive service to a customer is much different than the sum of the price of parts and labor. If a customer has to return to the shop for a problem that was paid for and not fixed, there is an additional cost of the customer's time and maybe even emotional stress—after all, when they are driving, their lives depend on their cars. This situation is common enough in the industry to have a name, a “come-back.” As an automotive technician I strove to minimize my come-backs through diligence and adherence to procedures, and as the owner of an automotive shop I will go even further. I will make come-backs a matter of public record, and I will also document remedies to prevent ever having a come-back for the same reason twice. I'm not so naïve as to expect that I will never make a mistake that will require a customer to return to my shop, but my customers will know that no other shop does more to minimize that possibility.

A second way in which I will buck the trend of common automotive repair shops is narrow specialization. While virtually all cars share many similarities, the devil is in the details. It is understandable that automotive shops want to increase business volume, and therefore offer to work on a sufficient variety of cars. But by refusing to specialize, the overall efficiency and quality of repairs goes down. Furthermore, shops need to maintain a larger and more diverse inventory of parts and costly specialty tools to service their clients. I've chosen my specializations for several reasons. For Think's, the reasoning is fairly self-explanatory: I am just about the only person that has any experience at all working on these cars. I also have extensive experience and working on Prius. The diagnostic software and hardware required to work on Prius are the same used for all Toyota/Lexus/Scion models. Some aftermarket tools claim to be a substitute for the genuine Toyota TechStream, but I have found them to be error-prone or lacking complete data. Other generic tools that can be used on all makes and models of cars lack many of the valuable diagnostic features that are available with the manufactures' equipment. Limiting myself to Toyota products will limit the expense of subscription fees that accompany the software and information systems, but will still leave a huge prospective customer base.

The final pieces of the mission statement, "at a reasonable price and with a completely transparent process" go hand-in-hand. The expense of maintaining and repairing a car is quite high for many car owners, and it is reasonable for them to want to understand that expense. I will make all of the business' finances, including all profits transferred to me personally, publicly available for anyone to inspect. This transparency is an effort to establish trust with customers in an industry that is rife with distrust. Even the amount of time spent working on cars will be available for customers to review through video surveillance. The recorded video will also allow me to review my work and find mistakes or problems in my procedures if errors become apparent after a service.

Another fundamental selling proposition that sets my business apart from typical automotive shops is selling parts at-cost. I am of the opinion that the value a part does not change as it is passed from the manufacturer to a distributor to a repair shop to a customer. There are certainly expenses associated with the

transportation, storage and capital necessary to get that part from the manufacturer to the customer. The expense incurred in passing the part from my repair shop to the customer is reflected more accurately by adjusting either the labor rate or the number of labor hours billed to the customer. Most shops add a tiered mark-up to the cost of the part; for example, a shop might add 50% to the cost of a part between \$10 and \$20, and 25% to the cost of a part between \$20 and \$50, and so on. Not only is this system somewhat arbitrary, it is a rare shop that would disclose it to customers. As a result, some customers buy their parts elsewhere and bring them to the shop for installation, and this can result in a poor repair if the customer's part is poor quality (if it is even the correct part). My proposition—that the customer pays the exact same cost as I do—is designed to build trust with my clients. It also reduces the conflict of interest that arises from my role as both the inspector and the supplier of the parts.

Market Research

Anyone who has ever owned a car is probably at least somewhat familiar with the automotive service industry. Consumers (car owners) often have very little understanding of automotive issues and therefore have to trust their service providers to treat them fairly. As a result, brand name and customer reviews play an important role in recruiting new customers and creating loyal repeat customers.

My automotive service shop will consist of two basic markets: Think and Prius (along with other Toyota-brand passenger vehicles).

Think

My unique experience as a Think warranty service technician makes me one of the few people in the country that can reliably and economically repair Think. While some Think services are typical of any automobile and can be performed by any competent service shop (like tires and brakes), many of the common failures require specialized knowledge of specific software applications and mechanical procedures that have been developed and refined through trial and error and extensive repetition. Think owners, therefore, are essentially a captive market; they really have nowhere else to go. Because of this I feel an obligation to make sure that these customers are treated fairly, and I think that I have earned many Think

owners' trust and a reputation that makes my knowledge sought from across the US and Europe.

Thinks will continue to need maintenance and repairs for many years to come, but the services and repairs that I anticipated prior to operating at Green Drop Garage did not match exactly what I experienced. One of the main outliers was the drastic decrease in the number of MLEC replacements from previous years; part of this is certainly due to the warmer months that are tabulated here and the cause of MLEC failure being related to use of the cabin heater. Hopefully, though, the decrease can be attributed to awareness of the root cause of the problem and customers actions to prevent it. Other services that were performed fewer times than predicted were front brake replacement and tires (simply because my repair facility did not have tire replacement capability).

Surprisingly, Thinks required more of some specific services than I anticipated. Traction battery repair was not even on my radar based on my previous years of Think service. I had replaced a few RLECs (circuit boards inside the battery) during my tenure at Hawthorne Auto Clinic, but it was a very rare condition. Encountering 10 instances in only a few months makes me think that water infiltration into the traction battery is going to be an ongoing problem that has simply taken a long time to surface. I have also noticed that some transaxles are slowly starting to make more noise, and I suspect that eventually many of them will require rebuilding. Such sharp increases in these two high-labor repairs is unfortunate for Think owners, but promising for my job security.

Services for Think City	Labor hours	Projected Services per year (estimated April 2016)	Actual services performed (4 months, June to September 2016)	Parts and consulting provided to remote customers	Revised Estimated Services per year
MLEC R&R	2.00	30	1	1	5
PCU R&R	8.00	10	5	1	12
Motor/transaxle R&R	12.00	1	2	-	5
Gear selector micro-switches	1.00	10	4	-	10
12k Service	3.00	20	6	-	18
Traction battery repair	5.00	-	4	6	15
Other remote consulting	Varies	-	N/A	5	15
Other diagnosis	Varies	-	3	-	10
Steering rack replacement	7.00	-	1	-	1
Tie rod ends	0.50	-	1	-	6
Replace 12V battery	1.50	10	12	-	20
Transaxle drain/fill	0.50	10	6	-	20
Brake flush	1.50	10	8	-	25
Front brake pads and rotors	2.00	10	1	-	5
Tire rotation	0.50	10	0	-	10
Tire replacement (4)	2.50	5	0	-	5
Tire patch	1.00	5	0	-	5

The table above was taken from the initial business plan for John M. Mayer, LLC and updated based on the intervening several months of experience. The overall effect is that my new estimate for Think labor is about 40% greater than I had originally projected. My original projections were for about 25 labor hours per month

of Think work. What I actually experienced during my time at Green Drop Garage was demand for about 35 labor hours per month, and my new projections are in line with those observations.

I am happy to do my part to keep these fun little cars on the road and making their drivers happy for as long as possible, but it's simply not enough work to keep a business running, even with only one full-time owner/operator. So the other half of my automotive service will focus on Toyota Prius, a model ubiquitous on the streets of Portland.

Prius

Hybrid cars require specialized training for handling of high voltage systems and components, though unlike Think service, there are plenty of well-trained technicians and an enormous manufacturing infrastructure to support Toyotas. When I first began my career as an automotive service technician at Hawthorne Auto Clinic many customers had the impression that hybrid gas-electric vehicles could only be worked on by dealerships. While any shop can perform basic services on hybrids (like oil changes and tire replacement), only shops that invest in specialized training are capable of safely diagnosing and repairing high voltage traction batteries, inverters, motors and more.

The staple of automotive service is engine oil change, and this goes for Prius as well (but not for electric vehicles like Think which have motors, not engines). Other regular maintenance items that I anticipate to be in demand for Prius service include engine and cabin air filter replacements, transmission fluid replacement, bulb replacements, tire rotations, tire replacement, brake pad/rotor and drum/shoe replacements 12 Volt battery replacement, steering and suspension component replacements and tune-ups which include spark plug replacement. Diagnosis and repair services will usually require connection of diagnostic hardware and reference to manufacturer information and technical service bulletins. Replacement of hybrid vehicle traction batteries and inverters are not entirely uncommon. As many Prius are now turning 15 years old, we may begin to see engine repair become a cost-effective means of keeping very fuel-efficient vehicles on the road.

Marketing and Sales

The goal of my business is to create demand for my services exceeding what I can supply. I plan on providing higher quality service and lower prices than competitors. To be clear though, this is not a race to the bottom, to attract the customers that desire maximum services for minimum payment; I will not compete with franchise quick-lube shops. The competitors that I seek to challenge price-wise are those that offer a similar level of quality and expertise. This model maximizes the use of fixed-expense resources and minimizes marketing expenses.

My shop will operate in a manner that has more similarities with dental offices and veterinary clinics than most automotive shops. Many car owners think of automotive repair facilities as drop-in, on-demand services whether for regular maintenance or restoring a car to a driveable condition. My business will schedule regular maintenance and inspections during the first part of the day, and reserve a certain amount of time in the afternoon for time-sensitive services. Clients that have already had regular maintenance performed will have preferred status (through scheduling preference and labor rates) for urgent, on-demand services. In the same way that you would probably prefer to go to your regular dentist when you have a dental emergency, or you would give preference to your regular vet when your pet has an acute need—my shop will develop a loyal clientele based on expertise and familiarity. Eventually sales will reach an equilibrium in which new and repeat customers will schedule regular appointments weeks in advance, and my time will be fully utilized.

Of course, Think and Prius owners will need to know about my shop before they will beat my door down for service. Distributing this information to Think owners is a trivial task; the Think community is small, and many owners are already directly in contact with me through email. Marketing my services to Toyota customers will require more effort.

I hope that my unique selling propositions will inspire enough interest to generate recognition in the news media. Local print (the Oregonian, Portland Tribune, Portland Business Journal, Willamette Week, Portland Mercury, Southeast Examiner, Green Living Journal, etc), radio (OPB, KNRK, KINK, etc), television (OPB,

KOIN, KATU) and their associated online media sources will receive a press release detailing the opening of the shop and ongoing operations.

The location of my shop will have a huge impact on the street traffic visibility. Not only will more prospective customers be more likely to become aware of my shop if it is located near the center of Portland, they will be more likely to bring their car to that location for service. Even if a customer is exposed to advertising for my shop, the location must be convenient so they don't have to go out of their way to buy my services.

I plan on acquiring and maintaining a small fleet of loaner vehicles available to customers to minimize the impact of vehicle service on their daily schedules. These cars may serve as an advertising platform.

Because expertise forms the foundation for reasons customers should choose to have their vehicles serviced by my shop and not others, I will invest heavily in establishing and communicating that expertise. I have already begun execution of this strategy through my website, thinkcitypdx.com. I offer lengthy, technical explanations of issues for Think owners and technicians. I also actively participate in online groups with EV enthusiasts. Because my Think customer base is captive, I have paid little attention to graphic design, website traffic statistics and search engine optimization. In a competitive market, these factors will be essential. If I can invest a relatively small amount of time providing free, valuable advice to Prius owners around the world through my website, then local Prius owners will be funnelled toward my business when they search for Prius service on the internet. While I have gained considerable skills in web development, my investment in web development needs to be directed toward content, and I will need to hire professionals for design and implementation.

Finally, I will need to invest in traditional advertising. Because I have no practical knowledge or experience in marketing, I will hire a consultant to provide guidance.

Financial Projections

The operation of John M. Mayer, LLC since inception up to this point in time is a basis for forecasting future financial outcomes, but at the same time, the business is undergoing many changes and some amount of unpredictability is the only certainty. The following table details revenues and expenses during a 5-month period:

4001	Sales of Services	\$5,893.00
4002	Resale of Goods	\$1,706.88
4003	Resale of Subcontracted Services	\$173.14
4000	Total Revenue	<u>\$7,773.02</u>
4501	Goods purchased for resale	\$1,752.74
4502	Services subcontracted for resale	\$170.13
4500	Total Cost of Sales	<u>\$1,922.87</u>
	Gross Profit	<u>\$5,850.15</u>
5005	Insurance	\$227.00
5006	Legal and Accounting	\$135.95
5007	Miscellaneous Expenses	\$296.49
5010	Shipping	\$0.00
5011	Rent Expense	\$36.00
5013	Supplies	\$297.35
5014	Travel	\$34.23
5017	Laundry	\$55.00
5018	Car washes	\$25.00
5019	EV Charging	\$8.44
5020	Parking	\$1.50
5021	Vehicle expenses	\$67.77
5022	Research and Development	\$44.80
5023	PayPal Merchant Fees	\$43.32
5024	Tools purchased under \$500	\$2,029.08
5025	Uniforms and clothing	\$295.97
5026	Furniture under \$500	\$114.00
5000	Total Operating Expenses	<u>\$3,711.90</u>
	Net profit	<u>\$2,138.25</u>

It's worth noting that between supplies, tools, uniforms, clothing and furniture, there is close to \$2,700 worth of expense. Many of the purchases in these categories will last for many years, and though I never expect these expenses to drop to zero, they will not be recurring with the same magnitude.

The balance sheet below shows that the business has no liabilities, but also that its assets compared to the start-up costs for a new shop location are small.

Balance sheet
31 October 2016

1001	Albina LLC Cash	\$773.68
1002	PayPal LLC Cash	\$0.00
1100	Accounts Receivable	\$819.24
1200	Inventory	\$0.00
1000	Current Assets	\$1,592.92
1500	Long-term Assets	\$0.00
	Total Assets	\$1,592.92
2000	Total Liabilities	\$0.00
3001	JM Investments	\$550.00
3002	JM Drawing	\$1,095.33
3003	Retained Earnings	\$2,138.25
	Total Liabilities and Equity	\$1,592.92

My simple model for revenue (creating profit only from sales of labor, and passing all other direct expenses through to the customer at-cost) makes that category of financial projections very straightforward. Revenue will depend directly on the hours billed and the labor rate. However, a myriad of caveats and compromises are built in to those two numbers. Concerning the number of hours billed: How many hours can I expect to bill to customers compared to the total number of hours that I work for the business? What is a reasonable ratio of hours billed to hours worked for an employee that works exclusively on customer cars? Will I bill the same number of hours for the same job as other shops do? If a labor guide indicates that a job should take one hour, but I become efficient enough that I can perform it in one half hour, should I still bill a full hour? What about the opposite situation? If a job consistently takes twice as long as it is alleged to take, should I still only bill what is prescribed? How will I account for non-labor consulting time with customers? Most automotive service shops offer “free” inspections; will I offer free inspections? Newer cars in better condition take less time to inspect and document than older cars in poorer condition; should I bill according to model year and condition? Concerning the labor rate: How much should I expect my labor rate

to vary from typical labor rates due to not marking up parts sales? Should I have separate labor rates for jobs of varying skill levels? All these questions are difficult to answer, but simply acknowledging them and setting clear and fair policies will increase trust with clients and prospective clients.

As a starting point, I think that it is safe to assume that I will be able to perform 4 hours of billable work per day, 5 days per week, 4 weeks per month, and I will be able to bill \$100/hour for my labor. (Although I expect it will take at least a few months to develop this volume of demand.) This results in a gross profit of \$8,000 per month or \$96,000 per year; this calculation assumes I am paid out of the profits and not through any wage or salary that counts toward expenses.

The following table shows income statement benchmarks for sole proprietor automotive repair shops from bizstats.com:

Sales	100.00%
Inventory (% of Sales)	1.78%
Cost of Sales	38.87%
COS-Labor Portion	3.98%
Gross Profit	61.13%
Salary-Wages	6.38%
Contract Labor-Commissions	2.60%
Rent	4.81%
Taxes	2.44%
Interest paid	1.12%
Amort. & Dep.	2.94%
Advertising	0.93%
Benefits-Pension	0.28%
Insurance (non-health)	1.42%
Home Office Expense	0.29%
Other SG&A Exp.	19.86%
Total Expenses	43.06%
Net Profit	18.07%
Total Direct Labor & NP	31.02%

My goal is to be able to draw \$2,000 (after taxes) per month from the business to be able to pay for personal expenses. This will require a net profit of 25%, and leave \$6,000 for all other expenses including taxes. I consider this to be a reasonable amount compared to the bizstats.com net profit of 18% after adding in the labor portion of cost of sales and indirect salaries and wages.

The following table estimates my typical monthly expenses for the business operating without employees:

Operating Expenses	
Rent (including NNNs)	\$2,000.00
Electricity	\$100.00
Water	\$75.00
Garbage and Recycling	\$50.00
Gas	\$100.00
Internet	\$100.00
Alarm system	\$50.00
Advertising/Marketing	\$300.00
Web development, maintena	\$300.00
Phone	\$100.00
Insurance	\$100.00
Industry organization memberships:	
iATN	\$45.00
SAE	\$22.42
ASE Exams	\$12.83
Education and training	\$100.00
TIS/TechStream subscription	\$92.00
Identifix subscription	\$0.00
Fleet vehicles/maintenance	\$100.00
Legal and Accounting	\$50.00
Miscellaneous Expenses	\$0.00
Postage	\$10.00
Shipping	\$10.00
Repair and maintenance	\$50.00
Office supplies	\$50.00
Small tools	\$500.00
Shop supplies	\$100.00
Process shop supplies	\$100.00
Environmental protection ex	\$30.00
Travel	\$100.00
Laundry	\$20.00
Car washes	\$20.00
EV Charging	\$10.00
Parking	\$5.00
Research and Development	\$20.00
PayPal Merchant Fees	\$250.00
Uniforms and clothing	\$50.00
Furniture under \$500	\$20.00
Bad debt	\$10.00
Property taxes	\$10.00
Licenses and fees	\$100.00
Depreciation	\$50.00
Interest Expense	\$100.00
Total Operating Expenses	\$5,312.25

The following table projects estimated costs for shop equipment:

Priority	Asset	Estimated cost	Cumulative total
Required	Computer with MS Windows OS	\$500	\$500
Required	MongoosePro, Drew Technologies	\$600	\$1,100
Required	Lift	\$4,000	\$5,100
Required	Air compressor, plumbing	\$500	\$5,600
Required	Brake parts washer	\$1,000	\$6,600
Required	Level 2 EVSE	\$500	\$6,100
Required	Oil tanks/delivery	\$200	\$6,300
Required	Waste oil/coolant tanks	\$100	\$6,400
Required	Oil drain	\$100	\$6,500
Required	Workbench with vise	\$200	\$6,700
Required	Material handling/storage, shelves, etc	\$500	\$7,200
Required	Phone(s)	\$300	\$7,500
Required	Exhaust hoses	\$100	\$7,600
High	ASE Blue Seal of Excellence Recognition Program	\$235	\$7,835
	Tire mount/dismount machine	\$2,000	\$9,835
	Tire balancer	\$2,000	\$11,835
	Arbor press	\$500	\$12,335
	Floor crane	\$300	\$12,635
	Engine stand	\$200	\$12,835
	Parts washer/solvent tank.	\$400	\$13,235
	Strut compressor	\$500	\$13,735
	Transmission jack	\$500	\$14,235
	Grinder	\$200	\$14,435
	Gas caddy/Fuel safe	\$300	\$14,735
	Alignment rack	\$5,000	\$19,735
	Alignment instrumentation	\$10,000	\$29,735
	A/C recovery machine	\$8,000	\$37,735
	Vacuum pump (for A/C)	\$200	\$37,935
Low	Pressure washing equipment	\$500	\$38,435

I have invested some time in researching the costs of various expenses and pieces of shop equipment, but a huge amount of uncertainty remains. In requesting an initial loan to cover start-up costs, for example, I will likely need to make provisions for a first month's rent, security deposit, and perhaps last month's rent. Depending on where I decide to lease, what size of facility I find, and other factors, this could total up to \$1,000 or it could be nearly \$10,000.

The following table lists some criteria for selection of a facility to lease:

Criteria for shop facility selection	Importance
Zoning: CM, CS, Industrial or Employment	Required
Grade-level, drive-in door(s)	Required
12 ft minimum clearance	Required
Location	Highest
Visibility/exposure	
On-site secure parking	
Rent	
Configuration of space	
Office space	
Waiting area	
Heat, A/C	Lowest