Puffer

COMPUTER SYSTEMS

Empowering Farmers to Repair their John Deere Tractors

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Table of Contents

1. Business Plan

   A. Product Description

      Puffer Computer Systems is a software development company based out of Sharon, Massachusetts that provides farmers with software to fix their John Deere tractors. With our software tools, farmers will be able to repair their tractors themselves, which will minimize machine downtime for repairs. This will save farmers time, money, and stress during peak season, and will be a statement win for the Right-to-Repair movement.

      Our company will offer two key products. First, we develop a complete embedded operating system for John Deere tractors that is compatible with the computers installed in the tractors from the factory. This operating system will be free and open source, based on the Linux kernel, and will be distributed on the internet such that any farmer can download it and install it into their tractor for free with the appropriate tools and knowledge. We recognize and expect that farmers are more interested in growing food than learning how to hack their equipment, so we plan to offer an installation service at our shop with our tools and know-how, giving peace of mind to farmers who don't want to learn how to hack their own tractor but still want to perform simple repairs themselves.

      Second, we develop a diagnostic software tool that we sell to farmers. This diagnostic tool will interface with our open source operating system, allowing farmers to scan their tractor computers, read any error codes, and perform their repairs themselves or with an independent mechanic with confidence. This diagnostic tool will be closed-source and distributed under a commercial license. However, we will do our best to make this software as affordable as possible to farmers. This plan bets heavily on the assumption that farmers don't mind paying for a software license, but they want access to the diagnostic tools themselves so that they can complete the repairs as quickly as possible.

      We are seeking $800,00 for 46.26% of our company, based on a post money value of $1,729,312 and a pre money value of $929,312.

   B. Market Problem

      The fundamental limitation farmers are currently dealing with is that the software installed on the Deere tractors is proprietary, which means that only John Deere technicians can fix the machines. Even for mechanical repairs like replacing a transmission, an independent mechanic cannot fully complete the job because the tractor's main computer must be programmed to "accept" the new transmission (Why American Farmers Are Hacking Their Tractors With Ukrainian Firmware). Without being programmed, the tractor will not be drivable. John Deere does this so that only their certified technicians and dealerships can work on Deere tractors, helping the company generate more revenue from service of existing equipment, instead of only making money by selling equipment in the first place. Deere is already approaching 10% of their total revenue coming from software and service, which is desirable because it's a

high-margin way to make money (Tractor Giant John Deere Eyes 10% of Revenue from Software Fees).

Farmers have been extremely upset about this; John Deere is widely regarded with a negative view in the farming community for this practice. Many farmers have been considering other tractor brands in recent years, and others have been turning to Ukrainian software to hack their tractors to do the repairs themselves. This creates enormous hassle for farmers, most who likely have a limited software background, when trying to figure out how to use these sketchy tools to fix their tractors at home. They could run the risk of bricking the on-board computer, or void their Deere warranty, with no guarantee of success and no reputable company standing behind the product.

The reason farmers use solutions like this is that John Deere tractors are the best tractors on the market. Deere sells 53% of large tractors in America, and 60% of combines (U.S. Agriculture Equipment Industry Report 2024). There's no doubt that Deere makes the best physical tractors, and have supported their machines with excellent software to boot. However, their greed has stained their reputation, and the fact that farmers are turning to Ukrainian hackers to fix the problem means that the market is ready for a real solution.

There is no trivial solution to this problem, and solving the problem is only going to get harder over time. That is because farmers depend on many of the features that John Deere implements in software. For example, some Deere tractors use GPS tracking with SpaceX's Starlink to show a farmer where a tractor is and what areas he has already sprayed with fertilizer (John Deere Machines Now Equipped with Starlink). Many of these software features surely required entire teams of engineers to implement, so it will be no easy task to walk over their moat and offer competitive software. However, the open source software community is very strong, and it's possible for a small team of outstanding highly motivated engineers to do incredible things in software that aren't possible in other industries. An excellent example of this is the Linux kernel, the largest open source software project in the world. There are a number of operating systems, based on this open source kernel, that are free and made publicly available to users.

Consider the unrelated market of desktop computers. The reader might compare Linux to MacOS, a (mostly) closed source operating system developed by Apple. While MacOS is better for many things, it's ultimately not upgradable by the user. It works very well out of the box with little configuration required, but any time your Macbook breaks, you have to take it to the Apple store to get it fixed. For most people, this is no big deal and can be done in an afternoon.

However, consider the farmer. His tractor breaks, and he can't just put it in his backpack and take it to the John Deere store. His machine might weigh 40 tons and might cost thousands of dollars to transport to the nearest dealership 50 miles away. He could call a technician to come out, which will cost him 250 dollars plus 130 dollars an hour (Glassdoor). Even if he needs to do something trivial like replace a battery, which might cost a few hundred bucks and 15 minutes if he could do it himself, will instead require an expensive trip for a technician to complete a trivial

task, easily doubling the price of the repair, not to mention making the job take hours instead of minutes.

John Deere has fully embraced this, which is partly why farmers are so infuriated with the company. There are limited ways around this; due to the way that software is distributed, particularly software that is embedded in a device like an on-board computer (technically known as firmware), it is extraordinarily difficult to reverse engineer a software system on the scale of Deere's, and "hack" it in a way such that these repairs would be possible.

A much more feasible approach is the one we have proposed: develop an open source operating system which will function the same as Deere's, but be designed for accessibility and ease of repair. This is a difficult undertaking, but more feasible than trying to hack existing code. We have two things going for us. First, we have the best software engineering talent in the world. Second, we have the power of the open source community on our side. What we are attempting for tractors has been done in the world of personal computers with the GNU/Linux (commonly known as Linux) operating system. Linux can boot onto pretty much any computer in the world, and it can be found everywhere (2 billion android devices, the modems in every phone, and 67% of the servers in the world). We plan to bring the success of the Linux project to agriculture technology, helping farmers repair their machines.

We will open source the operating system and distribute it under version 2 of the GNU General Public License, or GPL. The GPL is a special license; it makes software freely available for personal and commercial use, but demands that all changes made to the software must also be made open source. This is commonly referred to as copyleft (as opposed to copyright); greedy corporate people see this license as a "cancer which attaches itself to everything it touches", whereas the open source community sees this as a way to guarantee the continued freedom of the software being distributed. The license was created by Richard Stallman, a hero of the open source community.

Open sourcing the software which will run the tractor may seem counterintuitive, but there are good reasons to do this. First, the operating system controls what the tractor is capable of doing. Open sourcing such an operating system would get a lot of attention from the agriculture community, and Puffer Computer wants to be in the good graces of this community; we want to help them, and if we can help them, we can make money. Farmers will tell us what features they need, and what the priority is for implementing them, since it will be impossible to ship a complete operating system that rivals Deere's tech on the first try.

This approach accomplishes two important objectives: It preserves the ideals of the Right to Repair movement, while still allowing Puffer Computer to make money. Much as a farmer would buy a wrench to work on his tractor, the farmer can buy a software license from us to diagnose his own equipment. Certainly, the farmer would not expect the wrench to be free, but he would expect to be able to buy one at a hardware store. The same is true of the software license.

This is a similar business model to RedHat, the world's largest open source company, which develops an operating system aimed at enterprise applications based on the Linux kernel.

RedHat listens to their customers (which includes the Tufts Computer Science department), providing useful features and support to their users. RedHat is a direct competitor with Microsoft Windows, and have done very well for themselves, selling to IBM for 34 billion dollars in 2019. We hope to have similar success in the agriculture industry, which desperately needs a champion of open source and the right to repair.

    C. Addressable Market

Agriculture in the United States is an enormous market, and so is agricultural equipment. The U.S. agricultural equipment market is substantial, valued at approximately $42.05 billion in 2025, and is projected to reach $57.08 billion by 2030. Within this industry, John Deere holds a dominating 53% of the large tractor market and 60% of the combine market in the United States. Part of Deere's recent business strategy has been to increase their service and software revenue, which already approaches 10% of their total income. The rise of service and software revenue represents a favorable trend for our business model.

The repair market itself also presents a substantial opportunity. A recent report by the U.S. PIRG Education Fund found that American farmers lose approximately $4.2 billion annually due to equipment repair restrictions. This loss breaks down to $3 billion in lost productivity from equipment downtime and $1.2 billion in excess repair costs (Tractor Right to Repair would save U.S. Farmers 4.2 Billion). Crucially, the lost productivity due to downtime greatly outweighs the excess repair cost: this is why the software needs to be open source. This data supports our core theory that the farmer's greatest concern is with being able to repair the machine himself, and that he wouldn't mind paying 500 dollars for a software license when the tool could save him 10x-100x the license price.

We have two target customers: farm owners and independent repair shops. There are millions of farms in the United States, with approximately 88,000 of those being classified as large farms with a million dollars of revenue or more. Over half of the high-horsepower tractors being operated by these large farms are made by John Deere. There are also many independent diesel mechanics who help farmers service their equipment, which can be especially helpful when farmers are trying to fix mechanical issues during peak season. This is likely to be a much smaller market than farmers, but we still expect to sell hundreds of software licenses to this group.

We estimate that our total addressable market includes approximately 100,000 potential customers who own or repair computerized John Deere tractors. With our diagnostic software priced at $500 per license, this represents a maximum potential revenue of $50 million. Realistically, we expect adoption to grow gradually as our software improves over a few years. It will take a long time for our company to make headway into this market.

D. Go to Market Strategy

Our go-to-market strategy is designed to build trust with farmers while establishing Puffer Computer Systems as the legitimate alternative to both John Deere's restrictive software ecosystem and the less-than-reliable Ukrainian hacker solutions currently available. We plan to start by working closely with 50 farmers on the East Coast as we initially develop and test our operating system and diagnostic tools. We're starting on the east coast to keep our product testing near our headquarters. We also plan to go to many agricultural trade shows during this first year to advertise our product. We're heavily relying on word of mouth to help sell our product. The fact that Ukrainian firmware has become a player in this industry without a dedicated commercial force behind it shows that the farming community is strong and will come together to find solutions to problems. We're also hoping to demo our tools to independent mechanics. Many mechanics have been limited in their ability to service newer tractors without the Deere software, so we're hopeful that our software could make a difference in the agriculture repair industry as well.

We plan to publish strong support for our open source operating system, with extensive documentation for independent developers to work with and potentially contribute to our ecosystem. We will also have online forums that we monitor regularly to help farmers get their questions answered.

After we strengthen our reputation within the farming community on the East Coast, we will look to expand into the midwest, where the agriculture market in America is the strongest. In particular, midwestern farmers often grow crops like corn and soybeans which require large economies of scale to profit from, and as a result depend on large machinery. We're hoping to expand into this market starting towards the end of year two and the beginning of year 3, since we want to have a fairly mature product before we approach this market.

Our marketing approach will involve emphasizing to farmers that our software will let them control their own tractor, minimizing the risk of devastating downtime during peak growing and harvest season. Our product should give peace of mind to these farmers, and we will do our best to convince them of that.

We don't expect John Deere to sit idle as we enter the market. We anticipate they may start making more tools available to farmers in an attempt to crush our business. Our open-source approach provides some protection, as we'll have an active community working to maintain compatibility. Additionally, the right-to-repair movement continues to gain legal support, which will help safeguard our business model against aggressive manufacturer tactics.
As a direct competitor to Deere's service revenue, we are expected to face a response from Deere. However, the sheer size of the agriculture equipment market means we can develop sizable revenue even by taking a small percentage of the repair market share that Deere currently controls.

E. Competitors

John Deere controls most of the farm equipment market in the US, with 53% of large tractors and 60% of combines. They make a lot of money by preventing farmers from fixing their own equipment through special software that only dealers can access. Even though they promised some repair tools in 2023, these don't give farmers everything needed for repairs. Other companies like CNH Industrial, AGCO, and Kubota take similar approaches, but aren't as high profile as Deere because the other competitors don't sell as many machines. Ukrainian hackers offer ways around these restrictions, but these solutions have problems like no support, legal risks, and security issues.

We plan to create open-source software that gives farmers control of their own tractors and helps independent repair shops. This will reduce downtime during busy farming seasons. We'll start with John Deere equipment on the East Coast, then expand to the Midwest later when our product is more mature. Our approach includes strong documentation, online forums for support, and reaching out to independent mechanics. We expect John Deere to fight back, but our open-source community will help protect us.

F. Vital Metrics

Puffer Computer is particularly concerned with a few vital metrics. The majority of our business model is based on Software-as-a-Service (SaaS), so having a high gross margin percentage is extremely important for our company's success. In our first year, we have a gross margin of 84.44%, but by 5 years in operation, we plan to achieve a gross margin percentage of 96.45%. SaaS companies are often expected to have a gross margin percentage of over 95% to be considered healthy, so that is what we are aiming for.

We fully anticipate that it will take multiple years for us to become profitable, since we're trying to break into such a well-established industry. However, we hope to have a health profit margin above 20% by the end of year 3. We also hope to remain very liquid. We're asking for 800,000 dollars, which gives us a buffer and guarantees that our cash on hand never dips below 150,000 dollars, since we want the flexibility to hire more engineers if we want to accelerate our growth trajectory.

In terms of soft metrics, we plan to measure our initial success through both volume of operating system downloads and installs, as well as volume of sales of software licenses. These metrics will indicate community interest in our project, as well as the revenue potential that it has. We will also be paying close attention to our year-over-year license renewal rate. We expect that renewal rate to be very high (97%), as that will be the best metric we have for how effective our main money-making product is at helping farmers.

G. Management Team

Liam Drew - Co-Founding Software Engineer

Liam is a software engineer interested in computer systems. He graduated from Tufts University with a Computer Science degree in 2025. He worked at a farm during his summers in high school and has some knowledge of the American agriculture industry.

Matthew Armienti - Co-Founder, CMO

Matthew is a marketing and sales specialist. He graduated from the University of Oregon in 2025 with a degree in Business Administration. Using his talents, he will lead the effort to make our offering appealing, trustworthy, and reputable.

Milo Goldstein - Co-Founding Software Engineer

Milo is a software engineer interested in computer systems. He will graduate from Tufts University with a degree in Computer Science in 2026. Milo is an extraordinary software architect and has a strong understanding of computer hardware.

Jacob Carulli - Co-Founding Hardware Engineer

Jacob is a hardware engineer by training with a strong software background. He graduated from Tufts University with a degree in Computer Engineering in 2025. He is a computer architecture expert and will lead the firmware development effort.

H. Exit Opportunities

John Deere will be paying close attention to our company. We are cutting into their service revenues, and they will not be pleased by that. Ultimately, John Deere may decide that our business model of selling the farmer the ability to repair his own tractor makes sense. They may even be impressed by the open source operating system and diagnostic tools we create. Even if they make us a generous offer for the company, we will not sell to them because the entire purpose of our company was to empower farmers, and we feared that Deere would buy our company just to kill it, and continue price-gouging farmers.

We also expect to receive attention from Kubota, an emerging competitor in the North American tractor market. Kubota is a Japanese company that has been gaining a good reputation with American farmers through their ATV and small tractor offerings, and they are looking to break into the higher-margin large tractor market. However, many farmers are still loyal to Deere after a century of tractor development.

Seeing the impact that Puffer Computer could have in the agriculture community, Kubota may approach us with an offer. We hope we can convince them of the benefits of the open source development model, with paid (yet affordable) software licenses for mechanics and farmers. Even if Kubota made a lower offer than Deere, we would still want to sell to them, since we strongly believe in our company's mission, and we think Kubota would be a better candidate for providing support to the farming community

I.   Why Now?

The timing for Puffer Computer Systems to enter the market is perfect. The agriculture industry has been battling over Right-to-Repair for the last decade, with many class-action lawsuits between farmers and John Deere. Some farmers have resorted to buying Ukrainian firmware on unregulated forums and using it to hack their tractors. Clearly a legitimate market solution is needed, since Deere is refusing to provide one. A proper solution backed by an American company designed for American farmers is likely to take the market by storm.

The regulatory environment is also shifting in our favor. The Federal Trade Commission filed a lawsuit against John Deere in January 2025, claiming that the company has illegally withheld repair capabilities from farmers. Multiple states have introduced right-to-repair laws specifically targeting farm equipment, with Colorado becoming the first state to do so in 2023. This momentum is building across the country, creating a more favorable business environment for our products.

The technology is ready. The open-source software community is tremendously mature, and there is an abundance of knowledge available to help our expert engineers solve this problem. Our team's expertise in embedded systems combined with the growing number of software engineers committed to the right-to-repair movement gives us the technical strength to challenge John Deere's closed-source ecosystem.

With U.S. farmers losing $4.2 billion annually due to repair restrictions, with a majority of that loss coming from productivity loss due to machine downtime, the right to repair has become more important than ever. American farmers are ready for a reputable, American-made solution to the John Deere right to repair problem. We will champion the farmer's right to repair and provide the solution.

2. Investor Return Analysis

Investor Return Analysis	Year 0	Year 1	Year 2	Year 3	Year 4	Year 5 + Sale
Revenue	-	58,500	997,500	2,853,000	6,336,500	11,835,000
Total Expenses	-	(544,100)	(1,189,000)	(2,255,700)	(3,522,575)	(5,239,950)
Net Income	-	(485,600)	(191,500)	597,300	2,813,925	6,595,050
(+)Depreciation		45,000	45,000	50,000	50,000	5,000
(-)Changes in Working Capital		17,917	21,667	31,875	17,708	17,708
(-)CAPEX		(100,000)	0	(100,000)	0	0
Annual Cash Flow Before Financing		(522,683)	(124,833)	579,175	2,881,633	6,617,758
Equity Raised/Paid Off	800,000	-	-	-	-	-
Debt Raised/Paid Off	-	-	-	-	-	-
Dividends	-	0	0	(100,000)	(500,000)	(500,000)
Total Cash Flow Before Sale	800,000	(522,683)	(124,833)	479,175	2,381,633	6,117,758
Enterprise Value						17,797,004
Debt						0
Excess Cash						5,117,758
Net Terminal Value						22,914,762
Total Cash Flows to Equity	-	-	-	100,000	500,000	23,414,762
Post-Money Valuation	1,729,312					
Pre-Money Valuation	929,312					
Investor Ownership	46.26%					
Cash Flow to Investor	(800,000)	0	0	46,261	231,306	10,831,943
Investor IRR	70%	Sales Multiple	1.50			
MOI	13.89	EBITDA Multiple	2.03			

3. Financial Assumptions

There are a number of mechanics and technicians who work in Massachusetts as contractors. They can be hired for flexible hours, but must be paid a premium rate of 130 dollars an hour. The contract technicians are paid day-of install, so their wages are not included in the salaries outstanding.

During year 2, I hire a general and administrative person for 50,000 a year.

At the beginning of year 3, when it's clear that the company is about to become very profitable, everybody gets raises, including the contract technicians.

We sign a 1 year lease at the beginning of the first year, and then renew the same lease at the beginning of the second year. At the beginning of the third year, we lock in the lease for 3 years, at a slightly higher price.

Computers have 4 year straight line depreciation.
Testing hardware has 2 year straight line depreciation.
Old testing hardware is discarded after 2 years, hence the drop from 80,000 to 40,000 in year 3

The Enterprise value at the end of year 5 is calculated from the present value of future recurring cash flows in years 5 and beyond. I estimated my recurring cash flow to be $6,617,758 based on the Year over Year growth in Software License Sales.

I assumed the buyer will require a discount rate of 25%, and require $1,000,000 of cash to be kept in the company.

See the tables below for more information on the basic assumptions:

Revenue Assumptions	Year 1	Year 2	Year 3	Year 4	Year 5
Operating System Unit Distribution	50	1000	2000	3500	5000
Operating System Install Take Rate	70%	50%	40%	35%	30%
Number of Operating System Installs	35	500	800	1225	1500
Operating System Install Price	1,000	1,000	1,200	1,200	1,200
Operating System Install Revenue	35,000	500,000	960,000	1,470,000	1,800,000
Diagnostic Software Take Rate	95%	95%	95%	95%	95%
Diagnostic Software Renewal Rate	97%	97%	97%	97%	97%
Diagnostic Software Sales	47	950	2821	6061	10629
Total Active Software Licenses	47	995	3786	9733	20070
Annual Diagnostic Software License Price	500	500	500	500	500
Software License Revenue	23,500	497,500	1,893,000	4,866,500	10,035,000
Total Annual Revenue	58,500	997,500	2,853,000	6,336,500	11,835,000
Cost of Goods Sold					
Technician Hours Per Install	2	2	2	2	2
Contract Technician Hourly Wage	130	130	140	140	140
Labor Cost Per Install	260	260	280	280	280
Total COGS	9,100	130,000	224,000	343,000	420,000
Operating Expenses Assumptions					
Number of Software Engineers	2	5	8	10	12
Average Annual Salary	120,000	120,000	150,000	150,000	150,000
Number of Hardware Engineers	1	2	3	4	5
Average Annual Salary	110,000	110,000	125,000	125,000	125,000
Sales and Marketing Staff	1	1	1	1	1
Annual Salary	80,000	80,000	85,000	85,000	85,000
General and Administrative Staff	0	1	1	1	1
Annual Salary	50,000	50,000	55,000	55,000	55,000
Total Salaries	430,000	950,000	1,715,000	2,140,000	2,565,000
Office/Shop Annual Rent	48,000	48,000	51,600	51,600	51,600
Annual Utilities	12,000	16,000	16,000	16,000	16,000
Total Annual Operating Expenses	490,000	1,014,000	1,782,600	2,207,600	2,632,600

Working Capital Assumptions					
Days Sales Outstanding	0	0	0	0	0
Days Salaries Payable	15	15	15	15	15
Days Accounts Payable	15	15	15	15	15
Capital Expenditure Assumptions					
Computers	20,000	0	20,000	0	0
Testing Hardware	80,000	0	80,000	0	0
Total Capex	100,000	0	100,000	0	0
Depreciation					
Computers	5,000	5,000	10,000	10,000	5,000
Testing Hardware	40,000	40,000	40,000	40,000	0
Total Depreciation	45,000	45,000	50,000	50,000	5,000
Financing Assumptions					
Total PP&E Purchased	100,000	0	100,000	0	0
Startup Costs (Salaries & Rent)	490,000	0	0	0	0
Common Stock Issued	800,000	0	0	0	0
Common Stock Outstanding	800,000	800,000	800,000	800,000	800,000
Dividends	0	0	100,000	500,000	500,000

4. Financial Metrics

Financial Metrics	Year 1	Year 2	Year 3	Year 4	Year 5
Growth					
Revenue Growth	-	16.05	1.86	1.22	0.87
EBITDA Growth	-	-	-	3.47	1.32
Cash Flow From Operations Growth	-	-	-	3.24	1.30
Profitability and Returns					
Gross Margin %	84.44%	86.97%	92.15%	94.59%	96.45%
Profit Margin %	-	-	20.94%	44.41%	55.72%
EBITDA Margin %	-	-	29.67%	59.75%	74.21%
Return on Sales	-	-	27.91%	59.21%	74.30%
Return on Assets	-	-	86.36%	93.07%	72.19%
Return on Equity	-	-	96.31%	95.90%	73.04%
Cash Flow from Operations Margin %	-	-	23.81%	45.48%	55.92%
Liquidity & Working Capital					
Current Ratio	15.48	3.85	8.84	33.79	85.44
Quick Ratio	15.48	3.85	8.84	33.79	85.44
Days Sales Outstanding	0	0	0	0	0
Days Payable Outstanding (for salaries)	15	15	15	15	15
Inventory Turnover	-	-	-	-	-
Days Inventory Outstanding	-	-	-	-	-
Net Income + Depreciation	(440,600)	(146,500)	647,300	2,863,925	6,600,050
Cash Flow From Operations	(422,683)	(124,833)	679,175	2,881,633	6,617,758
Total Cash Flow	277,317	(124,833)	479,175	2,381,633	6,117,758
Leverage					
Common Stock Outstanding	800,000	800,000	800,000	800,000	800,000
Debt to Equity	-	-	-	-	-
Debt to Total Assets	-	-	-	-	-
Interest Coverage	-	-	-	-	-
Debt Service Coverage	-	-	-	-	-

5. Five Year Summary Pro Forma

Pro Forma Income Statements	Year 1	Year 2	Year 3	Year 4	Year 5
Revenue	58,500	997,500	2,853,000	6,336,500	11,835,000
Cost of Goods Sold					
Inventory	0	0	0	0	0
Hourly Labor	9,100	130,000	224,000	343,000	420,000
Gross Margin	49,400	867,500	2,629,000	5,993,500	11,415,000
Operating Expenses					
Salaries	430,000	950,000	1,715,000	2,140,000	2,565,000
Rent	48,000	48,000	51,600	51,600	51,600
Utilities	12,000	16,000	16,000	16,000	16,000
Total Operating	490,000	1,014,000	1,782,600	2,207,600	2,632,600
EBITDA	(440,600)	(146,500)	846,400	3,785,900	8,782,400
Depreciation	(45,000)	(45,000)	(50,000)	(50,000)	(5,000)
Interest Expense	0	0	0	0	0
Earnings Before Taxes	(485,600)	(191,500)	796,400	3,751,900	8,793,400
Taxes (25%)	0	0	199,100	937,975	2,198,350
Net Income	(485,600)	(191,500)	597,300	2,813,925	6,595,050

Pro Forma Balance Sheets					
Assets					
Cash	277,317	152,484	631,659	3,013,292	9,131,050
Receivables	0	0	0	0	0
Inventory	0	0	0	0	0
Current Assets	277,317	152,484	631,659	3,013,292	9,131,050
Long Term PP&E					
Computers	20,000	20,000	40,000	40,000	20,000
Testing Hardware	80,000	80,000	80,000	80,000	0
Computers Cumulative Depreciation	5,000	10,000	20,000	30,000	15,000
Hardware Cumulative Depreciation	40,000	80,000	40,000	80,000	0
Cumulative Depreciation	45,000	90,000	60,000	110,000	15,000
Net Book Value of PP&E	55,000	10,000	60,000	10,000	5,000
Total Assets	332,317	162,484	691,659	3,023,292	9,136,050
Liabilities and Owner's Equity					
Accounts Payable	0	0	0	0	0
Salaries Payable	17,917	39,584	71,459	89,167	106,875
Current Loans Payable	0	0	0	0	0
Current Liabilities	17,917	39,584	71,459	89,167	106,875
Long Term Debt	0	0	0	0	0
Total Liabilities	17,917	39,584	71,459	89,167	106,875
Common Stock	800,000	800,000	800,000	800,000	800,000
Retained Earnings	(485,600)	(677,100)	(179,800)	2,134,125	8,229,175
Total Owner's Equity	314,400	122,900	620,200	2,934,125	9,029,175
Total Liabilities and Owner's Equity	332,317	162,484	691,659	3,023,292	9,136,050

Pro Forma Cash Flows					
Net Income	(485,600)	(191,500)	597,300	2,813,925	6,595,050
Depreciation	45,000	45,000	50,000	50,000	5,000
Receivables	0	0	0	0	0
Inventory	0	0	0	0	0
Supplies	0	0	0	0	0
Accounts Payable	0	0	0	0	0
Change in Salaries Payable	17,917	21,667	31,875	17,708	17,708
Total Cash Flow from Operations	(422,683)	(124,833)	679,175	2,881,633	6,617,758
Purchase/Sale of PP&E	(100,000)	0	(100,000)	0	0
Securities	0	0	0	0	0
Other Long-Term Assets	0	0	0	0	0
Total Cash Flow from Investments	(100,000)	0	(100,000)	0	0
Short-Term Debt	0	0	0	0	0
Long-Term Debt	0	0	0	0	0
Common Stock	800,000	0	0	0	0
Dividends	0	0	(100,000)	(500,000)	(500,000)
Total Cash Flow From Financing	800,000	0	(100,000)	(500,000)	(500,000)
Total Annual Cash Flow	277,317	(124,833)	479,175	2,381,633	6,117,758
Beginning Period Cash	0	277,317	152,484	631,659	3,013,292
Ending Period Cash	277,317	152,484	631,659	3,013,292	9,131,050

6. Appendix

A. Year 1, Monthly Summary Pro Formas

Pro Forma Income Statements	January	February	March	April	May	June	July	August	September	November	December
Revenue	4,875	4,875	4,875	4,875	4,875	4,875	4,875	4,875	4,875	4,875	4,875
Cost of Goods Sold											
Inventory	0	0	0	0	0	0	0	0	0	0	0
Hourly Labor	759	759	759	759	759	759	759	759	759	759	759
Gross Margin	4,116	4,116	4,116	4,116	4,116	4,116	4,116	4,116	4,116	4,116	4,116
Operating Expenses											
Salaries	35,834	35,834	35,834	35,834	35,834	35,834	35,834	35,834	35,834	35,834	35,834
Rent	4,000	4,000	4,000	4,000	4,000	4,000	4,000	4,000	4,000	4,000	4,000
Utilities	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000
Total Operating	40,834	40,834	40,834	40,834	40,834	40,834	40,834	40,834	40,834	40,834	40,834
EBITDA											
Depreciation	(3,750)	(3,750)	(3,750)	(3,750)	(3,750)	(3,750)	(3,750)	(3,750)	(3,750)	(3,750)	(3,750)
Interest Expense	0	0	0	0	0	0	0	0	0	0	0
Earnings Before Taxes	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)
Taxes (25%)	0	0	0	0	0	0	0	0	0	0	0
Net Income	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)

Pro Forma Balance Sheets											
Assets											
Cash	681,199	644,481	607,763	571,045	534,327	497,609	460,891	424,173	387,455	350,737	314,019
Receivables	0	0	0	0	0	0	0	0	0	0	0
Inventory	0	0	0	0	0	0	0	0	0	0	0
Current Assets	681,199	644,481	607,763	571,045	534,327	497,609	460,891	424,173	387,455	350,737	314,019
Long Term PP&E											
Computers	20,000	20,000	20,000	20,000	20,000	20,000	20,000	20,000	20,000	20,000	20,000
Testing Hardware	80,000	80,000	80,000	80,000	80,000	80,000	80,000	80,000	80,000	80,000	80,000
Computers Cumulative Depreciation	417	834	1,251	1,668	2,085	2,502	2,919	3,336	3,753	4,170	4,587
Hardware Cumulative Depreciation	3,334	6,668	10,002	13,336	16,670	20,004	23,338	26,672	30,006	33,340	36,674
Cumulative Depreciation	3,750	7,500	11,250	15,000	18,750	22,500	26,250	30,000	33,750	37,500	41,250
Net Book Value of PP&E	96,250	92,500	88,750	85,000	81,250	77,500	73,750	70,000	66,250	62,500	58,750
Total Assets	777,449	736,981	696,513	656,045	615,577	575,109	534,641	494,173	453,705	413,237	372,769
Liabilities and Owner's Equity											
Accounts Payable	0	0	0	0	0	0	0	0	0	0	0
Salaries Payable	17,917	17,917	17,917	17,917	17,917	17,917	17,917	17,917	17,917	17,917	17,917
Current Loans Payable	0	0	0	0	0	0	0	0	0	0	0
Current Liabilities	17,917	17,917	17,917	17,917	17,917	17,917	17,917	17,917	17,917	17,917	17,917
Long Term Debt	0	0	0	0	0	0	0	0	0	0	0
Total Liabilities	17,917	17,917	17,917	17,917	17,917	17,917	17,917	17,917	17,917	17,917	17,917
Common Stock	800,000	800,000	800,000	800,000	800,000	800,000	800,000	800,000	800,000	800,000	800,000
Retained Earnings	(40,468)	(80,936)	(121,404)	(161,872)	(202,340)	(242,808)	(283,276)	(323,744)	(364,212)	(404,680)	(445,148)
Total Owner's Equity	759,532	719,064	678,596	638,128	597,660	557,192	516,724	476,256	435,788	395,320	354,852
Total Liabilities and Owner's Equity	777,449	736,981	696,513	656,045	615,577	575,109	534,641	494,173	453,705	413,237	372,769

Pro Forma Cash Flows											
Net Income	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)	(40,468)
Depreciation	3,750	3,750	3,750	3,750	3,750	3,750	3,750	3,750	3,750	3,750	3,750
Receivables	0	0	0	0	0	0	0	0	0	0	0
Inventory	0	0	0	0	0	0	0	0	0	0	0
Supplies	0	0	0	0	0	0	0	0	0	0	0
Accounts Payable	0	0	0	0	0	0	0	0	0	0	0
Change in Salaries Payable	17,917	0	0	0	0	0	0	0	0	0	0
Total Cash Flow from Operations	(18,801)	(36,718)	(36,718)	(36,718)	(36,718)	(36,718)	(36,718)	(36,718)	(36,718)	(36,718)	(36,718)
Purchase/Sale of PP&E	(100,000)	0	0	0	0	0	0	0	0	0	0
Securities	0	0	0	0	0	0	0	0	0	0	0
Other Long-Term Assets	0	0	0	0	0	0	0	0	0	0	0
Total Cash Flow from Investments	(100,000)	0	0	0	0	0	0	0	0	0	0
Short-Term Debt	0	0	0	0	0	0	0	0	0	0	0
Long-Term Debt	0	0	0	0	0	0	0	0	0	0	0
Common Stock	800,000	0	0	0	0	0	0	0	0	0	0
Dividends	0	0	0	0	0	0	0	0	0	0	0
Total Cash Flow From Financing	800,000	0	0	0	0	0	0	0	0	0	0
Total Monthly Cash Flow	681,199	(36,718)	(36,718)	(36,718)	(36,718)	(36,718)	(36,718)	(36,718)	(36,718)	(36,718)	(36,718)
Beginning Period Cash	0	681,199	644,481	607,763	571,045	534,327	497,609	460,891	424,173	387,455	350,737
Ending Period Cash	681,199	644,481	607,763	571,045	534,327	497,609	460,891	424,173	387,455	350,737	314,019

B. Year 2, Quarterly Summary Pro Formas

Pro Forma Income Statements	Quarter 1	Quarter 2	Quarter 3	Quarter 4
Revenue	249,375	249,375	249,375	249,375
Cost of Goods Sold				
Inventory	0	0	0	0
Hourly Labor	32,500	32,500	32,500	32,500
Gross Margin	216,875	216,875	216,875	216,875
Operating Expenses				
Salaries	237,500	237,500	237,500	237,500
Rent	12,000	12,000	12,000	12,000
Utilities	4,000	4,000	4,000	4,000
Total Operating	253,500	253,500	253,500	253,500
EBITDA	(36,625)	(36,625)	(36,625)	(36,625)
Depreciation	(11,250)	(11,250)	(11,250)	(11,250)
Interest Expense	0	0	0	0
Earnings Before Taxes	(47,875)	(47,875)	(47,875)	(47,875)
Taxes (25%)	0	0	0	0
Net Income	(47,875)	(47,875)	(47,875)	(47,875)

Pro Forma Balance Sheets				
Assets				
Cash	262,359	225,734	189,109	152,484
Receivables	0	0	0	0
Inventory	0	0	0	0
Current Assets	262,359	225,734	189,109	152,484
Long Term PP&E				
Computers	20,000	20,000	20,000	20,000
Testing Hardware	80,000	80,000	80,000	80,000
Computers Cumulative Depreciation	6,250	7,500	8,750	10,000
Hardware Cumulative Depreciation	50,000	60,000	70,000	80,000
Cumulative Depreciation	56,250	67,500	78,750	90,000
Net Book Value of PP&E	43,750	32,500	21,250	10,000
Total Assets	306,109	258,234	210,359	162,484
Liabilities and Owner's Equity				
Accounts Payable	0	0	0	0
Salaries Payable	39,584	39,584	39,584	39,584
Current Loans Payable	0	0	0	0
Current Liabilities	39,584	39,584	39,584	39,584
Long Term Debt	0	0	0	0
Total Liabilities	39,584	39,584	39,584	39,584
Common Stock	800,000	800,000	800,000	800,000
Retained Earnings	(533,475)	(581,350)	(629,225)	(677,100)
Total Owner's Equity	266,525	218,650	170,775	122,900
Total Liabilities and Owner's Equity	306,109	258,234	210,359	162,484

Pro Forma Cash Flows				
Net Income	(47,875)	(47,875)	(47,875)	(47,875)
Depreciation	11,250	11,250	11,250	11,250
Receivables	0	0	0	0
Inventory	0	0	0	0
Supplies	0	0	0	0
Accounts Payable	0	0	0	0
Change in Salaries Payable	21,667	0	0	0
Total Cash Flow from Operations	(14,958)	(36,625)	(36,625)	(36,625)
Purchase/Sale of PP&E	0	0	0	0
Securities	0	0	0	0
Other Long-Term Assets	0	0	0	0
Total Cash Flow from Investments	0	0	0	0
Short-Term Debt	0	0	0	0
Long-Term Debt	0	0	0	0
Common Stock	0	0	0	0
Dividends	0	0	0	0
Total Cash Flow From Financing	0	0	0	0
Total Quarterly Cash Flow	(14,958)	(36,625)	(36,625)	(36,625)
Beginning Period Cash	277,317	262,359	225,734	189,109
Ending Period Cash	262,359	225,734	189,109	152,484

C. Break Even Analysis

Note: The company breaks even in Year 3 with 3,621 total customers needed (800 OS installs + 2,821 diagnostic software licenses), which is above the break-even point of 2,732 units.

Break Even Analysis	Total	% Fixed	Gross Fixed	Gross Variable
COGS				
Contract Technician Labor	(224,000)	0	-	(224,000)
OPEX				
Software Engineer Salaries	(1,200,000)	100.00%	(1,200,000)	-
Hardware Engineer Salaries	(375,000)	100.00%	(375,000)	-
Sales & Marketing Salary	(85,000)	100.00%	(85,000)	-
Administrative Salary	(55,000)	100.00%	(55,000)	-
Rent	(51,600)	100.00%	(51,600)	-
Utilities	(16,000)	100.00%	(16,000)	-
OTHER				
Depreciation	(50,000)	100.00%	(50,000)	-
TOTAL EXPENSES	(2,056,600)		(1,832,600)	(224,000)
Break Even Volume				
Fixed Costs	(1,832,600)			
Depreciation	(50,000)			
Weighted Average Selling Price	749			
Weighted Average Variable Unit Cost	79			
Net Profit / Unit	671			
Break Even Volume (Units)	2,732			
Break Even Volume ($)	2,047,154			

D. Capital Expenditure Schedule

Capex Schedule	Year 1	Year 2	Year 3	Year 4	Year 5
Item					
Computers	20,000	20,000	40,000	40,000	40,000
Depreciation	5,000	5,000	10,000	10,000	5,000
Accumulated Depreciation	5,000	10,000	20,000	30,000	35,000
Net Asset Value	15,000	10,000	20,000	10,000	5,000
Testing Hardware	80,000	80,000	160,000	160,000	160,000
Depreciation	40,000	40,000	40,000	40,000	0
Accumulated Depreciation	40,000	80,000	120,000	160,000	160,000
Net Asset Value	40,000	0	40,000	0	0
Net Book Value of PP&E	55,000	10,000	60,000	10,000	5,000

E. Debt and Equity Financing Schedule

Debt and Equity Financing Schedule	Year 1	Year 2	Year 3	Year 4	Year 5
Common Stock	800000				
Debt Raised	0	0	0	0	0
Total Financing	800000	800000	800000	800000	800000

F. Labor Staffing Schedule

Labor Staffing Schedule	Year 1	Year 2	Year 3	Year 4	Year 5
Positions					
Software Engineer	2	5	8	10	12
Hardware Engineer	1	2	3	4	5
Contract Technician	5	20	40	60	80
Sales & Marketing Staff	1	1	1	1	1
Administrative Staff	0	1	1	1	1
Labor Cost					
Software Engineer	120,000	120,000	150,000	150,000	150,000
Hardware Engineer	110,000	110,000	125,000	125,000	125,000
Contract Technician (hourly)	130	130	140	140	140
Sales & Marketing Staff	80,000	80,000	85,000	85,000	85,000
Administrative Staff	50,000	50,000	55,000	55,000	55,000
Salaried Employee Hours					
9am-5pm, Monday-Friday					
Contractor Hours					
9am-5pm, Monday-Friday as needed					
Total Wages	439,100	1,080,000	1,939,000	2,483,000	2,985,000

G. Industry Financial Metrics

Industry Financial Metrics	John Deere	CNH	AGCO	Kubota	Year 1	Year 2	Year 3	Year 4	Year 5
Revenue	51,700	19,800	11,700	21,450	592,664	712,336	780,197	906,859	1,037,630
COGS	36,190	14,850	8,775	15,872	117,569	132,735	145,375	168,968	193,326
EBITDA	9,300	2,400	1,750	2,250	136,938	210,363	187,897	284,355	384,025
Net Income	7,000	1,200	(424)	1,640	104,602	163,343	145,369	222,536	302,273
Cash Flow from Operations	7,500	1,300	580	1,760	112,683	169,809	154,177	227,939	307,647
%Gross Margin	30.00%	25.00%	25.00%	26.00%	80.20%	81.40%	81.40%	81.40%	81.40%
% EBITDA Margin	18.00%	12.10%	15.00%	10.50%	23.10%	29.50%	24.10%	31.40%	37.00%
ROS	13.50%	6.10%	-	7.60%	22.10%	28.70%	23.30%	30.70%	36.40%
ROA	10.20%	3.50%	-	6.50%	43.90%	71.90%	65.60%	102.90%	143.10%
ROE	32.00%	12.00%	-	15.20%	87.20%	136.1%	121.1%	185.5%	251.9%

H. Valuation and Capital Structure

Valuation and Capital Structure	
Capital Needed From Investors	800,000
Post-Money Valuation	1,729,312
Pre-Money Valuation	929,312
Investor Ownership	46.26%

I. Terminal Value Analysis

Terminal Value Analysis	
Annual Net Income	6,595,050
Depreciation	5,000
Interest	0
CAPEX	0
Capital Reserved for Buyer	1,000,000
Recurring Cash Flow	6,617,758
Buyer's Discount Rate	25%
Enterprise Value	17,797,004
Debt	0
Excess Cash	5,117,758
Terminal Value	22,914,762

J. Implementation Time Table

	Implementation Time Table
Day 0	Initial 800,000 dollar investment, sign office lease
Day 1	Hire a software engineer and hardware engineer, buy 20k of office computers and 80k of testing hardware. Start development of operating system
Day 15	First salary installments paid to engineers
Year 1	Install about 4 Operating Systems per month.
Year 2	Hire more engineers to improve diagnostic software
Year 3	Hire more engineers, give raises to both engineers and technicians. Buy new computers and testing hardware
Year 4	Hire more engineers
Year 5	Hire more engineers

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