



Building your Laser Tag

Six mistakes to avoid!



Doug Willems

Summary

Laser tag is a fantastic attraction, and can be a lucrative business opportunity.

To help you make the most of the laser tag opportunity, we've put together an outline of the factors Delta Strike has learned that are crucial to building a thriving laser tag business. This is built on the personal experience of Delta Strike's founder and CEO Doug Willems' own success to operating a center, and [x] years of supporting laser tag businesses around the world with products and support.

The six success factors for a thriving laser tag center include:

Location, location, location:

success depends on a **viable location**. Today, Laser Tag Centers are found anywhere from shopping malls to industrial trading estates. This White Paper identifies essential factors to consider when choosing a location, from population distribution to car parking.

Spreading your risk:

The key to many successful Laser Tag Centers is **diversification**. This can be on a large scale such as establishing a Family Entertainment Center (FEC) or more easily achievable in the form of birthday party rooms or arcades.

Designing a great experience:

the **design of the arena**. There are many secrets to success encompassed in just this one aspect of a Laser Tag operation: interactivity, lighting, sound and theming. Even the lobby counts. Critical in arena design is the input of Laser Tag industry professionals and/or expert Laser Tag consumers.

'Bullet-proof' equipment:

success is ultimately about the bottom line, and your choice of **Laser Tag equipment** and its quality and reliability can have a direct impact on profits. The fourth section of this White Paper details everything you need to know to make the right equipment choice.

Creating the fun: game-play.

What games and how long should they be? We use our own experience and international research to point you in the right direction.

Good people and good process:

the generic success factors that apply to all businesses: **staffing and systems**. Laser Tag is a customer-facing business and no matter if you have the right location, arena, equipment and game-play, you still need to meet your visitors' service expectations.

Section 1

Location, Location, Location

Summary

One of the most important decisions a new business owner has to make, is the location. Although every country or city holds its own unique dynamics, there are a number of common considerations that can point you in the direction of success. In this white paper we go through the important factors you must consider when choosing a location for your laser tag center.



Is there an ideal population size?

The population base surrounding your Laser Tag center can have a huge influence on your success, especially if there is a lot of competition close by.

An unwritten rule of thumb in the Laser Tag industry is that if you have a population of less than 80,000 to 100,000 within a 10 to 15 mile (15-25km) radius; chances are your business will struggle.

However, there can be exceptions to this rule:

- You may have a large city close by that brings a high traffic count past your location. This, along with excellent site visibility from busy roads or highways, could make the location viable.
- The location may be a well-established entertainment or tourism destination with a vast amount of multi-entertainment services available within a dedicated area where customers can be attracted from afar.

Identifying & rating competition

While considering centres of population, we recommend identifying the location of your competition. Consider how the population is distributed around these sites, as well as how near they are located to your own potential site. If it appears that your population share will be limited due to the central or strategic location of the competition, it may be advisable to re-consider the entire project.

When doing your research, visit your closest competitors and rate each competitor on their delivery. Consider the quality of their service, the arena, equipment and add-ons. If it is poor and you know it could be done better, then maybe a location near a competitor could still be successful.

What about urban areas?

Successful Laser Tag centers can be found in all types of population areas, urban areas are no exception. There are pros and cons to each site and these vary significantly depending on the country and its culture. However, if the right research is conducted in the planning process, you can easily audit your location selection beforehand.



Shopping Malls

Shopping malls attract a wide range of customers all over the world. Hot and humid countries like parts of China, Malaysia and Dubai for example, tend to favor locating Laser Tag centers within shopping malls. In these countries, malls are the go-to place for social activity, partly due to the cool and comfortable environment.

A few things to take into consideration to ensure success when locating your business in a shopping mall are:

Rent

Securing a reasonable rent rate is an essential part of the success equation and malls may demand high rents.

To reduce rental, keep your arena small and if possible use multi-level arenas to maximize the space. Be aware that many malls require revenue splits from their tenants, effectively increasing rent rates.

Opening Hours

Malls typically require the tenant to keep to the hours that the mall is open. For instance, late night gaming on Fridays may not be possible if a mall closes at 9.00pm. This problem can often be averted by locating your business close to an alternative exit and arranging for an exemption on following opening hours as part of the lease agreement.

Foot traffic

Request information on mall usage for comparison purposes. The bigger and busier the mall, the better the chance of success.

Six Success Factors for a Winning Laser Tag Center



Industrial Areas

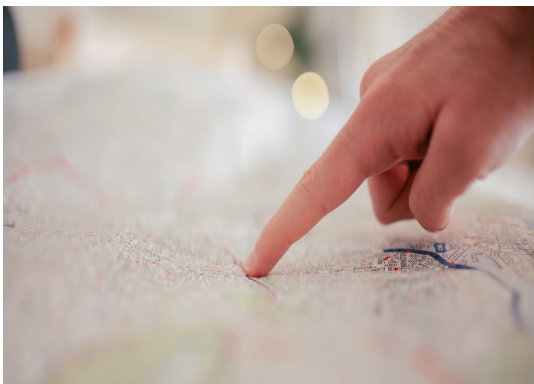
Locating your laser tag center in an industrial area can mean access to cheaper rent rates in districts not too far from the city center. If you can find an area that already attracts other entertainment businesses such as ten pin bowling, ice skating and racing karts then you know the area could very likely work for a Laser Tag business as well.



Residential Suburbs

Suburbs often have the advantage of being completely surrounded by your ideal customer base - residential housing, full of children and teenagers itching to play Laser Tag.

High visibility locations, which can be costly, are not necessarily required since Laser Tag is a destination based business. Class B real estate has been a successful choice for many centers.



Entertainment Hotspots

Statistics say that Laser Tag businesses that are located close to other entertainment services, especially non-competitive, will perform better on average. Having other entertainment services close by brings two advantages:

- The market has already proven that entertainment businesses in this location can succeed – that’s why they’re still there.
- Locals are more likely to visit since they already associate the area as an entertainment hotspot.



Tourist Destinations

Tourist destinations, especially, will very often command a higher rent rate. Containing your Laser Tag business within a modest sized footprint will ensure rents do not stifle profit margins. Multi-level arenas can be a good investment since they can accommodate more players and therefore increase profits.

Be warned however, if the tourist market is seasonal, your income will likely follow this trend.



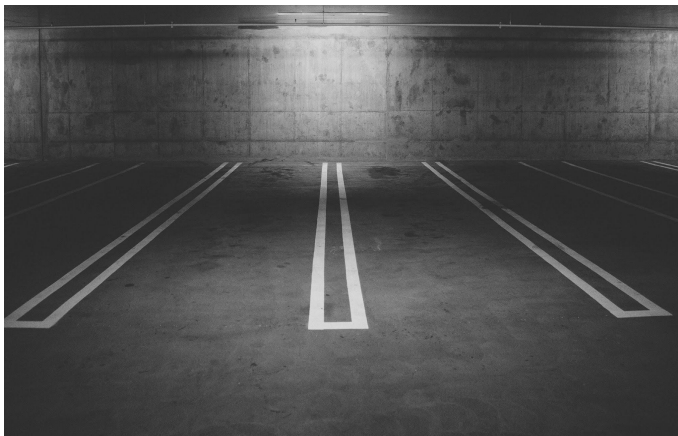
City Centers

City Center locations are similar to tourist areas in that they command high rent rates. Again, multi-level arenas can help with this. Locating your business close to other entertainment businesses in the city center can also be advantageous.

Don't Forget Parking

Good quality car parking is going to ensure your site is easy to access. Ideally, parking facilities will be close to your center and there will be sufficient spaces to cater for the busiest days.

The car parks, as well as the passage to and from the car parks, will be safe and secure for customers of all ages.



You will need to investigate Local Authority or City Council requirements: what is the minimum number of car parks legally required for a Laser Tag center or equivalent?

This will depend on the size of your Laser Tag facility and it is usually based on the maximum number of players per hour on your busiest day.

Every local authority seems to have a different set of rules and unfortunately there are some that will over compensate. The costs in providing extra and often unnecessary car parks can decrease profits to the point where the project becomes uneconomical.

Don't be discouraged by a first ruling. Presenting a well thought-out case to your local authority representative can very often create an excellent case for reconsideration, it just takes persistence.

Section 2

Spreading your risk: Diversification

Family Entertainment Centers (FEC)

Over the last ten years many Laser Tag services have successfully combined with other entertainment facilities such as:

- Bowling centers
- Skating parks
- Go-Kart centers
- Climbing wall centers
- Soft-play centers
- Trampoline parks
- Mini-golf centers
- Skating rinks



Family Entertainment Centers (FEC's) also often include a café or restaurant, redemption games and birthday party facilities.

There are three good reasons why Laser Tag businesses are adding to their entertainment mix:

- People are more likely to go to a multi-entertainment center because there is more to do.
- Customers will be entertained for longer and are prepared to travel greater distances to get there, effectively increasing the catchment area for that business
- Multi-entertainment centers benefit from cost advantages; they utilize shared facilities such as reception, restrooms and arcade areas.

The downside is that setting up a multi-entertainment site is not for the fainthearted. The costs can be high, and the building compliances can be complicated and time consuming.

Birthday Party Rooms

In the majority of cases a birthday party room is a worthwhile addition to your center and in some can be the reason for success. However, there are some exceptions. Three factors could negate or limit the need for a party room.

Age of Market

Laser Tag entertainment is new to many countries. Statistics show that when Laser Tag is introduced to a new market, it will initially attract an older age group. Since birthday parties are seldom celebrated in “play environments” after the age of 11 or 12, the need for party room facilities may be minimal until Laser Tag has become established in the market.

In North America where Laser Tag has been around for over 30 years, more than 50% of customers will be coming to celebrate a birthday party. Thus if setting up a Laser Tag business in Indianapolis in the United States, or Montreal in Canada for example, at least two birthday party rooms would be considered.

Rental Rates

As previously mentioned, in hotter locations such as South China, Dubai or Mexico, centers are likely to be in a mall due to the cooler environment. Rent rates in malls are often higher and the extra room required for the birthday party rooms may make this option financially unviable.

Arcade Machines

Arcade machines generally work well within Laser Tag centers as they provide entertainment for customers while they are waiting for their game and, of course, they provide an additional income stream to your business.

The cost to invest can be very low. Most cities have a local provider who will deliver, install and maintain arcade machines for free in return for a profit share.

Perhaps you have the room to accommodate a dedicated arcade service with 20 to 30 arcade machines.

Arcade services of this scale often include redemption services which for, many entertainment centers, have been immensely popular – and profitable.



Section 3

Designing a Great Experience: Your Laser Tag arena

Design

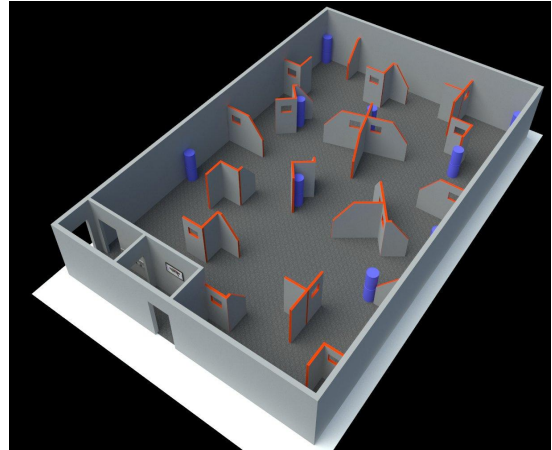
The design, layout and theming of your arena will have a massive influence on your centers' popularity, especially if you have competition close by. An effective design will create a stimulating environment that makes people want to come back again and again, and spread the word.

The secret to a successful design is to involve people who are passionate about Laser Tag.

You can achieve this in a number of ways:

Work with an architect but insist that your architect consult with at least one expert Laser Tag player who will understand what constitutes dynamic game-play. A Laser Tag expert will recommend partitioning that is not too cramped or too open, appropriate locations for walls, platforms, forts and base stations and a design that incorporates charisma and mystique. All of which will result in ongoing fun and excitement for your customers.

Alternatively, you can seek advice from within the industry itself. Arena manufacturers will often include a free layout design with an Arena purchase, and Delta Strike provides a free layout design service customized to your building with all Laser Tag system purchases.



Arena Interactivity

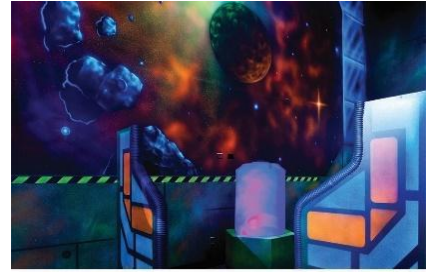
When designing your arena, consider the location of interactive arena components. These can potentially be a point of difference between your Laser Tag center and a competitor. Interactive arena components are electronic devices that can be installed onto walls and partitions within the arena. They should surprise and delight players with interactivity that varies from game to game, encouraging repeat visits, and again triggering word of mouth marketing.



Six Success Factors for a Winning Laser Tag Center

Arena Theming

The arena is not just about the design. You must also decide on a theme that adds the “Wow” factor, making your arena memorable and creating an exciting environment for game-play. All of the following strategies have resulted in successfully themed centers: Specialist arena suppliers: where a specialist arena supplier has been engaged, they will work with you on the theme.



This can potentially be money well spent and will likely include all the partitions, props and themed painting on the majority of the internal partitioning.

DIY: alternatively, once the arena is built, you could decide on a theme yourself. You could use a local graffiti artist or go with a simple industrial look and use some “artistic” friends to help with the painting.

Professional artist: many Laser Tag Centers have created a successful theme by employing a good quality artist with a known reputation. This person can airbrush and stencil professional artwork around your arena. The visual impact could be potentially huge and get your Laser Tag Center widely talked about.

Six Success Factors for a Winning Laser Tag Center

Arena Lighting

There are three types of lighting systems that are normally installed into Laser Tag arenas:

Emergency lighting: normally a grid of white fluorescents that can switch on independently of other lighting. They are used during emergencies, as well as for maintenance and cleaning of the arena.

Black lights: in the past, black light fluorescent tubes have always been used to create the backdrop of UV lighting, the lighting that makes light colors stand out. Nowadays, LED black lights are also being utilized. They have the advantage of greater control and flexibility; however, they do cost more per lumen output.

Special effects lighting: special effects lighting can transform your arena into a mysterious, exciting environment. It is probably one of the most cost-effective means of creating atmosphere when compared to other setup costs. LED lighting is perfect for this because it is bright, colorful, low maintenance, low cost and easy to control with software. This will enable light patterns to vary and change, synchronizing with the game-play itself or the music, providing the ultimate in visual game immersion.



DMX LIGHTING CONTROL PROTOCOL

DMX is the primary method for linking controllers (such as a lighting console) to dimmers and special effects devices such as fog machines and intelligent lights i.e. LED lighting. Make sure the Laser Tag system you purchase can integrate with a DMX lighting system.

Arena Sound

As with lighting, the sound systems of today can also be very affordable and are another cost-effective means to add to atmosphere. Use James Bond tracks or computer game classics to get people in the mood, or Star Wars and Superman theme tunes for birthday parties. Avoid purchasing an inadequate system that adds nothing to the ambience:

Buy a system that has extra “headroom” enabling the volume to be turned up for special events such as member gaming nights or corporate group events.

Research your supplier and ensure that they have the necessary experience to correctly specify and install an easy to manage sound system appropriate for your arena layout and size.

Multi-level Arenas

Multi-level arenas literally add another dimension to the experience and will always be appreciated by your players for providing a more strategically challenging environment. However, it will cost more to build per square foot/meter than ground level partitioning. This additional initial investment should be weighed up against the ability to accommodate more players and therefore increase profits.

If your Laser Tag facility is in a building with high lease costs, then utilizing spare space above the arena, if it is available, can make a lot of sense. Effectively you are still paying the same in monthly lease costs, with the advantage of increasing the number of players per game and most importantly, the corresponding income for your center.

The Lobby

Also worth considering is the Lobby, offering a modern, comfortable environment where visitors can relax and enjoy the atmosphere. The lobby is where first impressions are made.

Unfortunately, many Laser Tag lobbies have been themed with a dark and imposing look to emulate the theming within the arena. This results in a waiting area that can seem unwelcoming.

Many centers now decorate the lobby area as a clean and modern environment with brighter lighting than in the vesting and arena areas.

Many successful locations decorate the lobby area to appeal to the 20+ age group. The logic is that a 20-year-old is not interested in visiting places that have been decorated for younger children. However, a 6-year-old will want to go to the same cool places that people in their 20's visit.



Section 4

Bulletproof Equipment: Choosing the Right Gear

The Laser Tag equipment you use is a major factor in enticing customers to return to your center. Having reliable, hi-tech equipment with exciting games will ensure your players can lose themselves in an exciting and challenging fantasy world.

Equipment Reliability

When players come to your center they will be very excited. If their phaser stops working during a game, this can be incredibly disappointing. Equipment reliability is paramount. Equipment that is constantly out of action will impact your business with both lost profits as well as lost reputation.



Equipment Look and Feel

Customers today have a much higher expectation in terms of quality of experience compared to twenty years ago. Having paid good money at the counter, there is a real expectation that the equipment at your center will be impressive.

The Laser Tag equipment is central to the whole gaming experience. A product that looks similar to a cheap toy can only disappoint. The idea is to allow players to be that futuristic space warrior they imagined they could be. A large percentage of Laser Tag players are also video gamers. Choosing a system that incorporates video game elements like multiple weapons, shields and a heads up display with in-game messages makes all the difference in creating that otherworld experience.



Ease of Use/Weight

Ease of use again directly relates to your ability to make money. You want the most automated equipment to ensure faster throughput and smooth operations.

As the Laser Tag market in a country moves from infancy to become more established, the average age of the Laser Tag customer decreases. To ensure that your Laser Tag equipment will cater for all sectors of the market, not only should it look impressive, but it should also be easy to use and lightweight enough for younger children to wear and handle.

Arena Components

The importance of interactivity as part of your arena design was discussed earlier. Interactivity is provided via “Arena Components”. Arena components can include Base Stations, Wall Targets, Laser Shooters and Gateways. They make possible Player versus Arena scenarios meaning that even with a small group the crucial competitive element is intact.

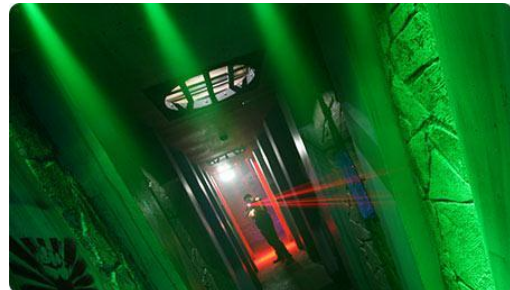
Video Base Stations are the latest in arena components, introduced to the Laser Tag industry by Delta Strike. They provide onscreen guidance with voiceover, to explain each arena component as encountered. This minimizes the need for lengthy pregame explanations and makes arena components more accessible for new or less regular players.

Video also has the added advantage of a much greater choice of options than non-video base stations. Since it is a video image, it can potentially be used as any of the following:

- Ammunition dispenser
- Power-up dispenser
- Weapons dispenser
- It can be a base station or a goal
- Players can pick up collectables
- Non-regulars can access in game hints



Some video base stations also come with additional Laser Tag games such as non-combative quizzes or capture the flag style games, appealing to broader markets such as corporate team building events and school/social groups. Interactive arena components are critical for generating high levels of engagement and repeat visits, particularly from your hardcore Laser Tag fans.



Ease of Repair/Management

Phasers and vests get smashed against walls, dropped on the floor, sweated on, given the “tug of war” treatment, and are sometimes even vandalized. Whilst your equipment supplier will hopefully have worked very hard to build a reliable laser tag system that is extremely tough, at some stage equipment will need to be fixed and repairs need to be as easy as possible for your staff. Look for plug and play spare parts replacement, labelled sockets, induction training for staff, easy to use manuals and no stress wireless upgrades to software. A web portal offering equipment diagnostics, operational reports and online ordering for spare parts makes life simpler for remote managers or for owners of more than one center.

Section 5

Creating the Fun: Game Play

Game Depth and Variety

Today's customers are far more discerning than previously and are very familiar with the world of video gaming. They will no longer keep returning to play the same game over and over. You need to thoroughly assess the game depth and game variety of your Laser Tag equipment supplier to ensure the success of your Laser Tag center. Some Laser Tag software offers the option to modify games and create your own games.

Researching what your competitors are using in your geographical area is a worthwhile exercise. Investing in a premium system will ensure that your site has a competitive advantage. Premium products also discourage future potential competitors setting up shop close by.



Games per Hour

The number of games that are played per hour varies greatly from center to center. There is no hard and fast rule but this decision requires serious thought as it obviously directly impacts on turnover and profit. Our opinions are based on knowledge accumulated whilst working at the coalface of the Laser Tag industry.

One game per hour: we do not recommend such long sessions. In our experience after 8 to 10 minutes of high octane excitement and exercise, players need recovery time. The adrenaline high starts to decline and after 15 minutes, the game ends on a low. From our experience in the industry, long game times tend to reduce income and profitability.

Six games per hour: you would think that customers would complain bitterly at such short sessions. However, from our observations, this is not the case. These centers support their model with a pricing structure that allows customers to purchase multiple games at cheaper prices.

Three to five games per hour: this is the most common game format. If you are setting up a Laser Tag center for the first time, perhaps three to four games per hour is a good place to start. You can always increase this at a later stage. A 10 to 12 minute game keeps customers at a high level of enjoyment and adrenaline which keeps them coming back for more.

Varying games per hour: some centers vary the number of games per hour on different days. For example, five games per hour during busy weekends and four games per hour during the quieter weekdays.

Membership Software

Success relies on repeat business and membership software encourages hardcore players back to your Center again and again. Research the membership software offered by your Laser Tag equipment supplier and ensure that it includes the latest features to beat the competition. Members should be able to personalize their profile and access their accounts via a range of media (app, social networks, browser).

Section 6

Repacking Your Games

Packaging Laser Tag games is not a new concept. The basic premise is that the more games that are purchased, the cheaper the price. Delta Strike examines different packaging formats from the perspective of increasing catchment area and maintaining or increasing income.

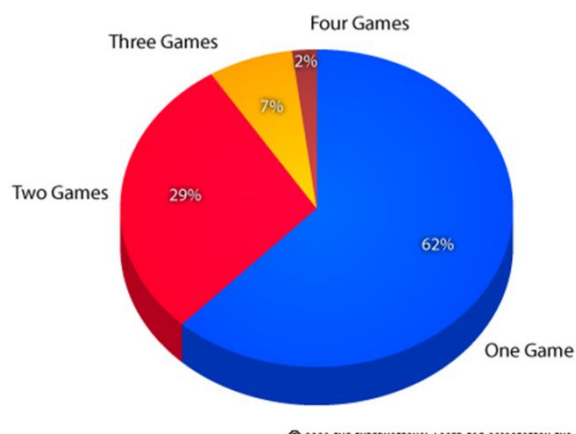
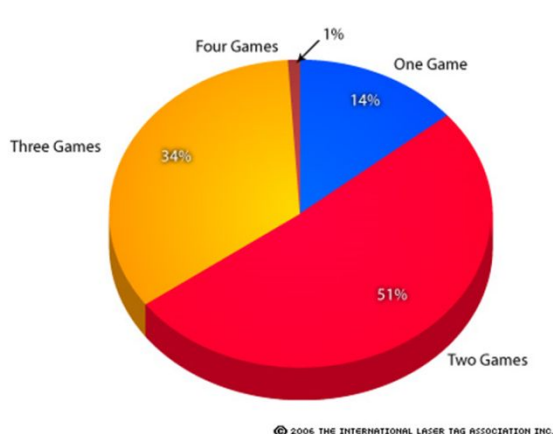
Introducing discounted combo packages

Example A: 4 Games per hour

4 GAMES PER HOUR		
10 Min. Game time 5 min. Changeover time		
	Time	Sample Price
1 Game	15 minutes	\$7.00
2 Games	30 minutes	\$12.00
3 Games	45 minutes	\$15.00

This model provides customers with 15 minutes game time but they are encouraged to buy more than one game by the discounted pricing. By purchasing a package, they will increase the duration of their visit to 30 or 40 minutes, thereby doubling or tripling your current catchment area.

Research into the impact of offering multi-game discounts clearly shows the impact that it can have on the duration of time the majority of customers will spend at a Laser Tag Center.



Reducing game time and/or changeover time

In this model, by reducing the game time by one minute to 9 minutes and reducing the changeover time to 3 minutes, you can significantly increase your potential income by running five games per hour. Using the same scenario as above, customers are encouraged to buy more than one game with discounted pricing, increasing entertainment duration to 24 or 36 minutes, so still impacting positively on catchment area.

Example A: 5 Games or more per hour

5+ GAMES PER HOUR		
9 Min. Game time 3 min. Changeover time		
	Time	Sample Price
1 Game	12 minutes	\$6.00
2 Games	24 minutes	\$10.00
3 Games	36 minutes	\$13.00

A three-minute turnaround is incredibly fast by anyone's standards and Delta Strike advises playing it safe, particularly when first establishing your Laser Tag Center, perhaps by using an 8 + 4 minute combination. As discussed above, due to the way that adrenalin functions,

Laser Tag Centers do not necessarily have to fear the impact of reducing game time. In fact, a well-known standalone Laser Tag Center in the USA utilizes a 7+3 minute format. Rather than the 7 minute game being too short and irritating customers or impacting negatively on catchment area, the Center offers packaged games that provide excellent value for money and most players purchase 2 and 3 game packages, ensuring reasonable entertainment duration. This site also enjoys an excellent trade in arcade and redemption services.

Introducing a break between games

Example C: 4 Games or more per hour- with extended entertainment break

4 GAMES PER HOUR		
10 Min. Game time 5 Min. Changeover time 15 Min. break time		
	Time	Sample Price
1 Game	15 minutes	\$7.00
2 Games/1 Break	45 minutes	\$12.00
3 Games/2 Breaks	75 minutes	\$15.00

Example D: 5 Games or more per hour- with extended entertainment break

5 GAMES PER HOUR		
9 Min. Game time 3 Min. Changeover time 12 Min. break time		
	Time	Sample Price
1 Game	12 minutes	\$6.00
2 Games/1 Break	36 minutes	\$10.00
3 Games/2 Breaks	60 minutes	\$13.00

Six Success Factors for a Winning Laser Tag Center

The game times are the same as in 3.3.1 and 3.3.2 above but with a 12 or 15 minute break between games. This model ensures that players have a long entertainment experience at your site for the same price.

In example C, using the standard 15 minute (10+5) game time, a two game purchase plus a break means that the entertainment time increases from 30 to 45 minutes. This is a 50% increase in the duration of the entertainment and will result in a corresponding increase in catchment area of over 100%. The three game package increases entertainment time by 66%, which equates to a 175% increase in catchment area.



***Example C, including the break,
increases the catchment area by
more than 100%.***

In terms of income, the Laser Tag Center is still running the same number of games plus there are other potential benefits of having an additional group on a break:

The break between games is an excellent opportunity to earn extra income from other entertainment services like arcade and redemption games.

Your center will look a lot busier since your customers stay longer. A rule of thumb for entertainment businesses is that if a center looks popular, it becomes popular.

Section 7

Good people and good process: The Keys to Success

Imagine a Laser Tag center that is fun, dynamic, clean, tidy and the games are always on time. Your customers will leave with some great memories. Customer satisfaction is all about the day to day operations within your center. Choosing the right staff and utilizing superior business systems will ensure your business exceeds your customers' expectations.

Employing Staff

Choose employees for their attitude first and skills second. Up-skilling is far easier than trying to improve someone's work attitude later on. Laser Tag is very much a customer based business and it is important to select front line staff that have a respectful and friendly disposition. Throw in honesty and initiative, and you now have a crew that will make a huge difference to the life and success of your business.

Your most important employee is your Center Manager. If you get it wrong your business will suffer. We all know that a bad attitude at the top will filter all the way down to unhappy customers and lost profits.

Business Systems

So once you have an excellent team, you can close the loop with fantastic business systems. Research franchise management, follow their lead and ensure that your Laser Tag business is well systemized. Everything is done correctly and on time resulting in your customers having nothing but great things to say about your business. If you need help with systemizing your business, Delta Strike provides extensive business development tools to help you plan and fine tune business operations.

Six Success Factors for a Winning Laser Tag Center

If you have any questions on how to set up your laser tag business, you can call us direct - simply go to the **contacts** page on our website, www.deltastrike.com and call the sales representative closest to you.

We hope this paper has been helpful and informative. There are many other white papers that can be downloaded free of charge from **Downloads** section of our website.



All the Best,

Doug Willems

CEO

Delta Strike

A handwritten signature in black ink, appearing to read 'Doug Willems', with a long horizontal flourish extending to the right.