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Important!

This mini version is basically a stripped down version of the full featured registered version of CASINO PLANNER for Craps. With this mini version, you will be able to "test drive" the software for yourself to see how practical CASINO PLANNER is for planning a winning trip to the casino. This mini version has the Game Mode in its entirety. However in the StrategyMaster Mode, **ONLY the Pass Line and Place 4 & Place 10 bets are FULLY functional**. Use these bets to learn how to use StrategyMaster (i.e. Money Management, Money Management Assistant, and results such as Fundamental Five, Highs and Lows, Averages and Totals, etc.). Once you have experience using StrategyMaster on the Pass Line, you will then be ready to use other bets in conjunction with more complex Betting Strategies.

See the **Order** menu for information on how to order the full featured registered version.

Why CASINO PLANNER?

Casino Entertainment What You Don't Know can Hurt You Fighting Fire with Fire A Much More Reliable Way to Win Winning 100% of the Time 90% WinRating Answers in the Matter of Minutes! Prepare and Compare

Casino Entertainment

Today, more and more Americans are looking for new forms of entertainment and gaming has become the popular choice for recreation and fun in the 90's. Gaming has become so popular that more people are visiting casinos than baseball stadiums and there are many good reasons why. Casinos offer exciting games, luxurious rooms, grand buffets, fine dining, elegant decor, courteous personal and the best in live entertainment. But there is more to gaming than meets the eye.

What You Don't Know can Hurt You

For a typical night out on the town you generally know how much you can expect to spend for the evening. With gaming this is not necessarily true. People can easily get caught up in the excitement of gaming and find themselves spending far more than they ever expected. It is not uncommon for a player to leave the casino with ALL his play money lost, and sometimes owing additional money in markers taken out at the table or in cash advances on credit cards. This happens most frequently when a player is not prepared AND does not know what to expect. They may rely on Lady Luck or the throw of the dice for an elusive chance of winning. You do not have to depend on luck to win. With a bit of preparation you can even have a better than 50% chance of coming home a winner from the casino.

Let's say you've just made reservations to go on a trip to the casino. Now what do you do? How do you prepare for your trip? Do you know all the rules of the game? What betting strategy should you use? How much money should you bring? How much Playtime can you expect? These are some *practical* questions that should cross your mind when you're getting ready to go to the casino. CASINO PLANNER has been designed expressly for this purpose.

DEFINITION: *Casino Planner*. An interactive multimedia game AND powerful planning tool that has unique features to teach you how to dramatically increase your chances of winning at a *real* casino.

Fighting Fire with Fire

It's you against the casino. Playing against the House can be like going to war. Even though the casino will eventually win the war, you can win a *majority* of the battles. However, at the end of each battle the victor does not gain land like in the traditional sense, rather the victor wins hard *cash* -- **definitely something worth battling for!** In our case, the crap table is the battlefield; you are a general and the casino is the opposing general.

Just like in a real battle, both sides must prepare for inevitable duel that is about to take place. But how does the casino prepare? The casino does not rely on luck to win and neither should you. Their plan is based on <u>simple probability of the dice</u>. In a similar manner, <u>you can use probability</u> to your advantage by using a well conceived Betting Strategy. Now you can be on an even playing field with the casino and thus dramatically increase your chances of winning. There's nothing complicated about it. It's all very simple and all you need is CASINO PLANNER.

A Much More Reliable Way to Win

Don't depend on luck because it will probably be BAD! Bad luck is the reason most people give when they lose. Many players have incredible strings of GOOD luck, yet still walk away from the table losing money. An exclusive feature of CASINO PLANNER called StrategyMasterTM, provides a much more reliable way to win. Using the information provided by StrategyMaster, you can accurately predict how your strategy will perform in "real-world" situations. But isn't craps based on random chance and luck? How could we possibly know in advance what will happen? The answer may surprise you. Though we can not *know* with absolute certainty what will happen in the future, we can have an accurate *expectation* of what will happen.

Take a simple coin toss as an example. Though you don't know what the next flip of the coin will be, the laws of probability will determine how many times "heads" or "tails" will come up (i.e. 50% for both). StrategyMaster uses probability to **accurately predict** how your strategy will perform <u>before</u> stepping up to the tables. With StrategyMaster you don't have to depend on luck anymore.

Winning 100% of the Time

Let's say you and a friend are going to gamble against each other and the name of the game you are going to play is called "Coin Flipping". The rules are simple. If heads shows you win a dollar, and if tails shows your friend wins a dollar. It is possible to beat your friend 100% of the time as long as *you* are the one who determines when the game (or session) is over. The rules of Probability say that if you keep playing against your friend, eventually heads will come up more often than tails, and when it does, you tell your friend the game is over -- you win!



A lot of people think that since heads has a 50% chance of showing, that your chances of winning are also 50%. THIS IS NOT TRUE! Don't confuse the two numbers. It's true that the chances of heads showing is 50%, however, your chances of winning can be as high as 100%, if you determine when the game is over. In other words, your chances of winning is NOT the same as the chances of heads showing.

For all practical purposes, casino games are a lot like coin flipping, as far as your chances of winning are concerned. Basically, casino games offer a *slightly* less than 50% chance for you to win. And since you, and NOT the casino, determine when to walk away from the table, you can likewise beat the casino a <u>majority</u> of the time.

CASINO PLANNER has an exclusive feature called the WinRating that makes it easier than ever for you to know when to walk away from the table a winner AND with the amount of money you want to win. Since casinos have a slight advantage, you can not win 100% of the time like in coin flipping, but you can have WinRatings around 90%.

90% WinRating

Even though it is easy for you to *win* more than 50% of the time, the casinos will still make their profits. Let's look at a simple example which will illustrate how it is possible to have a WinRating of 90%. For this example, your Betting Strategy will play *each session* that risks \$1,000 (bankroll) to win \$100 (win goal). Let's say the first session won \$100 while risking \$1000. The second session won \$100 while still risking \$1000. You win \$100 for nine consecutive sessions at the table and each time you never lost your \$1000 bankroll. However, on the tenth session, you lost \$1000 before you could reach your \$100 win goal. Therefore, you had a WinRating of 90% (i.e. won 9 out of 10 sessions) and the casino still made its profit of \$100. You can win a majority of the *battles* (i.e. sessions), but the casinos will always win the *war*.

Session #	Won/Loss	
1	\$100	
2	\$100	
3	\$100	
4	\$100	
5	\$100	
6	\$100	
7	\$100	
8	\$100	
9	\$100	
10	-\$1,000	
Net =	-\$100 down	

Answers in the Matter of Minutes!

CASINO PLANNER provides a new approach to casino entertainment. CASINO PLANNER is an interactive multimedia game and powerful planning tool. This software marks the beginning of a new era in casino gaming in which players can use their personal computer to prepare for a trip to the casino and thus *dramatically* increase their chances of winning at a real casino.

CASINO PLANNER takes advantage of the computational power of your personal computer to help you master the game of craps. You can *plan* for a winning trip to the casino by first trying out your crap strategies at home without risking your hard-earned money. This is accomplished by the APPLICATION abilities of StrategyMaster.

The basic concept behind StrategyMaster is very simple. You enter the crap strategy that you are interested in through a convenient window, then **in the matter of minutes** you are provided a wide range of important information about your strategy. Until now, the school of hard knocks at the casino was the only real proving ground to try out your ideas and strategies. CASINO PLANNER has changed all this.

Prepare and Compare

These are the two words that set CASINO PLANNER apart from all other software.

Prepare

"It is better to be *smart* than lucky!"

Being smart simply means being prepared. CASINO PLANNER is a program that is specifically designed to *prepare* you for a winning trip to the casino using exclusive features not found in any other software. CASINO PLANNER helps you plan for your trip by providing answers to ten of the toughest questions about your strategy.

- 1. What are the advantages and disadvantages of your strategy?
- 2. What are your **chances of winning** are in terms of percent? (i.e. WinRating[™])
- 3. How do you determine a realistic Win Goal?
- 4. What the chances are of **reaching your Win Goal**? (i.e. WinGoal Rating[™])
- 5. What kind of **bankroll** is needed to play your strategy?
- 6. How much **time** can you expect to play your strategy?
- 7. What is the expected "**cost per hour**" to play your strategy? (i.e. entertainment value)
- 8. What the House Advantage is for your *entire* strategy? (i.e. VigRatingTM)
- 9. How do you get WinRatings of greater than 50%?
- 10. When is the best time to **stop playing** to maximize your winnings? (Most players stop playing when they've lost all their money. Needless to say, this is the *worst* time to stop playing. But when is the best time?)

Ironically, most players don't know the answers to these questions, yet they want to win. Only CASINO PLANNER addresses *all* these questions so you can truly be *prepared* to win. On the contrary, if you are not prepared, the cost of your entertainment can easily be far greater than what you expected.

Prepare with CASINO PLANNER and gain experience and knowledge that would normally take a *lifetime* to acquire. You'll get hands-on experience using different strategies. The casino is not the place to learn how to play or try out your strategies. The pros can tell you this. Most have probably lost thousands or even tens of thousands of dollars in order to acquire all their experience and know-how. This kind of experience costs money and lots of it. But now with CASINO PLANNER, there is an easier way to gain this valuable insight. Then, each time you go to the casino you'll get the most from your entertainment dollars. Remember,

The Best Strategy for Winning is PREPARATION!

Compare

A very important part of preparing for your session at the table is choosing the strategy that is right for you. You do that by comparing different crap strategies. There are literally thousands of crap strategies. Using CASINO PLANNER, you can <u>objectively compare</u> crap strategies quickly and easily -- <u>all in the matter of</u> <u>minutes</u>. Just sit back and relax while the software runs countless "what if" scenarios to give you a clear, overall picture of just how any strategy will perform in "real-world" situations. With the results provided by StrategyMaster, you can determine for yourself the advantages and disadvantages for the strategies that you are interested in.

Learning with Interactive Multimedia

Interactive multimedia is rewriting the book on the way people learn. Two significant facts about interactive multimedia:

- 1. Interactive multimedia allows you to simulate what you cannot otherwise do.
- 2. Interactive multimedia affords you the opportunity to improve your performance and capability.

A person will typically remember:

- about 10% if they read it.
- about 20% if they hear it.
- about 30% if they see visuals related to what they're hearing.
- about 50% if they watch someone do something while explaining it.
- about 90% if they do it themselves -- even if it's a *simulation*.

A good application of this technology is in learning how to play the game of craps. A lot of people would like to play craps but are intimidated by the learning process. CASINO PLANNER for Craps is an interactive multimedia game/application that makes it easier than ever to master the game of craps.

Related Topics:

<u>Learning to Play</u> <u>Playing to Win</u>

Learning to Play

If you've never played craps before, you may be surprised to learn that it's really a very simple game. Many people will walk up to the table, watch the seemingly complicated action for a while and then walk away because it looks so intimidating. In reality, the rules of craps are very simple.

Hands-on experience is the best way to learn a new game. If you're like most people, you learn faster by doing. CASINO PLANNER brings the sights and sounds of a real casino into your living room. If you're a beginner, the "Craps Tutor" will teach you how to play and walk you through the basics of the game at your own pace in the privacy of your home. You will be playing in no time -- even if you've never even seen the game before. Then you will gain experience by practicing at the IGS crap table.

Playing to Win

Knowing how to play DOES NOT mean you know how to win. The key to winning is to having a well planned strategy. A strategy is simply a session at the table in which you have *everything* planned out from the time you purchase your chips to the time you leave the table.

A strategy has two basic parts:

- 1. *Money Management*. Your starting bankroll, win goal, loss limit and time limit.
- 2. *Betting Strategy.* When to make each bet and for how much.

StrategyMaster provides a wide range of important information such as the *Fundamental Five*TM, Highs and Lows, Averages and Totals to help dramatically increase your chances of winning at a real casino.

Inside the IGS "Casino"

The IGS Casino has all the sights and sounds of a real casino. Bets can be heard as they are placed and taken away. You can hear the dice being rolled as the shooter throws them across the table. You can listen as the stickman calls the outcome of each roll. In a real casino you can hear music playing in the background, the same is true inside the IGS Casino. You can even hear crowd sounds and slot machines in the background to experience the feel of a real casino!

Look at the IGS crap table. Notice that when you move the mouse over the table, the pointer appears as a "hand". Whenever the pointer is a hand you can click with the *left* mouse button to place bets and roll the dice. When the pointer becomes an arrow, you are near a control button or menu option. You can choose any control or menu option by clicking on it with the *left* mouse button.

Related Topics:

<u>Crap Table</u> <u>Unlabeled Bets on the Table</u> <u>Benefits of the Gray Table</u> <u>Instant Help on All Crap Bets</u>

Crap Table

The IGS crap table has the authentic layout of a real casino crap table. However, only one half of the IGS crap table is visible since the other half is a mirror image of the first half. Also, you will see how to play at the crap table with other animated players -- each with their own personality.

RECOMMENDATION: If the IGS crap table colors look a little dark, adjust the brightness knob on your monitor appropriately. Also, 256 colors will look **much better** than 16 colors.

Unlabeled Bets on the Table

Unfortunately, a real crap table only has *some* of the bets labeled with text on the layout. Bets that don't have text include, Place bets, Buy bets, Lay bets, Come and associated Free Odds bet, as well as, Don't Come bets and associated Free Odds bets. That's seven type of bets with that do not have a label on a *real* crap layout. For the IGS crap table, the following diagram shows areas where to click with the mouse button to make various bets that are not labeled on the table.



For a given bet type, only *one* example was given in the table. For example, there are six different Place bets on the Table (i.e. Place 4, 5, 6, 8, 9 and 10). Only the area where to make a Place 10 is shown in the above diagram, other Place bets are made in a similar manner. Notice the Place bet area covers the left most 50% area of where the 10 is marked on the table. The right most 50% area is for the Buy 10 bet. The other 5 numbers (i.e. 4, 5, 6, 8 and 9) follow the same convention for Place and Buy bets. The gray crap table distinguishes the "unlabeled" bets by using two different shades of gray.

Benefits of the Gray Table

From the **Options** menu, choose **Casino**. In the lower left side of the dialog, select the gray table and click OK. Now you will see a gray crap table. Notice there are light gray and dark gray areas on the layout. These different shadings of gray distinguish unlabeled bets and show where one bet area starts and another begins. Placing unlabeled bets is therefore more intuitive with the gray table. Also, the gray table makes it easier to see the colored chips resting on the table. For these reasons, you may want to play with the gray table most of the time.

Instant Help on All Crap Bets

There are times when you are interested in the certain aspects of a particular bet (i.e. you forgot payoff odds). Help for all the bets on the IGS crap table is just a mouse click away.

RECOMMENDATION: Hold down the SHIFT key and click with the *left* mouse button on the IGS crap table for instant On-line Help for the bet you are interested in.

Help information on a specific crap bet includes definition, true odds, payoff odds, house advantage, decision, and vigorish. When you are done with the help, go to the **File** menu and choose **Exit**.

RECOMMENDATION: While using the On-line Help, hold the ALT key and then press the TAB key to "toggle" you back and forth between On-line Help and the IGS crap table.

Control Panel

The Control Panel occupies the entire lower portion below the IGS crap table. It contains control and status information while using CASINO PLANNER. The following is a description each of the items in the control panel.

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Your Chips

In a casino, chips are used in place of cash to make bets. Slots around the top edge of the table called *rails* are used to hold the chips for each player. Look just below the IGS crap table at the left side area of the screen and you will see your chips. They come in different colors just like in a real casino. Each chip color is worth a certain amount of money. Chip colors are commonly defined as follows: White = \$1, Red = \$5, Green = \$25, Black = \$100, Pink = \$500. These chips represent your *bankroll*.



(Note: You can have a bankroll that exceeds \$5000, however no more than \$5000 in chips will be shown.)

Bankroll Rail

DEFINITION: *Bankroll Rail*. The place where your playing chips are kept for future bets.

Bankroll Amount - This is the dollar amount of your chips and is shown below the Bankroll Rail.

Bet Rail

DEFINITION: *Bet Rail*. The place where you "assemble" a bet amount before placing it on the IGS crap table.

Chips are taken out of the Bankroll Rail and assembled in the Bet Rail. Once the proper bet amount is assembled, it is ready to be placed on the IGS crap table. The money assembled in the Bet Rail will be placed on the table when you click with the left mouse button over the area of the table where you want to make a bet. In other words, if the Bet Rail contained a green chip and you clicked the FIELD bet area of the table with the left mouse button, you would see a green chip appear on the table.

Bet Rail Amount - This is the dollar amount of the chips and is shown below the Bet Rail.

Marker

There are times when you are playing craps and you do not have sufficient bankroll to make another bet. In this case you can click on the word "bankroll". This will bring up the "Marker" window which allows you to "borrow" money to keep playing. (Note: no strategies should require taking markers above and beyond your initial bankroll, but since players do take markers when they run out of money, CASINO PLANNER also allows you to do this. However, this is not a wise move and we advise you to play with strategies that do not require markers.

Roll Results

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Na Wiene Lave
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making bets. "Roll Results" cycles through 5 results each roll.

Just below the word "Bankroll" in the control panel is a status box. This Status Box keeps you informed as to what happens to your money *after* each roll. Just after the dice are rolled, the status box will cycle through five results:

- 1. Lost Total money lost from the current roll.
- 2. Won Total money won from the current roll
- 3. Net Sum of money won and lost for the current roll
- 4. Total Sum of current bankroll amount in the bankroll rail and all bets on the table (In other words, the total amount of money you have on and off the table.)
- 5. Ses Net Cumulative total of all money won or lost from the start of your session

You can adjust the rate at which CASINO PLANNER cycles through these five numbers. To do this, go to the **Options** menu and select **General**. If you are interested in the "roll results" and want to *read* them as the five cycled numbers then adjust the slide bar to the left to a slow setting. If you are not interested in the "roll results" then adjust the slide bar all the way to the right so as not to slow down your game.



The text in the control panel that says "On table shows the amount of all bets currently on the table.

Dice Roll Graph

Dice Rolls

The graph below the text "Dice Rolls on the control panel shows the <u>relative</u> number of times each dice number was rolled during the game. There are 11 tick marks at the bottom of the graph which represent all dice roll combinations 2-12. The left most tick mark represents the number of times the number 2 was rolled, and the right most represents the number of times the number 12 was rolled. As the game is played you should see the graph start to take the shape of a bell curve. The bars can be two colors. Black indicates that the dice accuracy for that number is within 5% of ideal number, if the color is blue the number is not.

It is interesting to note that you win more often when the bell curve deviates from the ideal bell curve. On the contrary, if the dice accuracy matches the ideal bell curve you will lose more often.

Roll Dice Button

<u>A</u>uto Roll



Use this button **to randomly roll the dice**. This button can be used in both the Game Mode and StrategyMaster Mode.

Auto Roll Button

Use this button

to have the dice rolled automatically by CASINO PLANNER in a random manner

After you click the "Auto Roll" button, it will turn into a "Stop" button. Click the "Stop" button to end "Auto Roll". This button can be used in both the Game Mode and StrategyMaster Mode.

Run Button

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Use this button to run a system that is entered into StrategyMaster through a dialog box interface. StrategyMaster will run as fast as your computer will allow in order to give you vital information contained in StrategyMaster results window. From the **Options** menu, choose **StrategyMaster**. This dialog box contains the "number of sessions" that StrategyMaster will run. A larger number of sessions will take StrategyMaster longer to run, but the results window will contain more accurate information.

This button is a short cut for the menu selection "**StrategyMaster/Run/Go** This button can only be used in the StrategyMaster Mode and cannot be used in the Game Mode.

Reset Button



Use this button **Leader** to reinitialize the current session In the StrategyMaster Mode, this button is a shortcut for the menu selection "**StrategyMaster/Run/Reset**". This button can be used in both Game Mode and StrategyMaster Mode.

Betting Strategy Button



Use this button **Learning** to take you to the dialog box where you can enter in the bets for your strategy. This button is a shortcut for the menu selection "StrategyMaster...Setup Strategy...Bets". This button can only be used in the StrategyMaster Mode and cannot be used in the Game Mode.

Time

The text in the control panel that says "Time" **Time: Ohr 1m** shows the amount of time that has been played at the table with respect to the number of rolls of the dice.

In a *real* casino you do not control when the dice are rolled, the stickman does. On average, the dice are rolled about every 30 seconds, or 120 rolls per hour. Under the **Options** menu, choose **Casino**. The default for the "Rolls per hour" is 120. Therefore, if there were 30 rolls of the dice, this would mean the Control Panel "Time:" would show 0 hr 15m. In other words, if you were at a real casino, you would have been playing for about 15 minutes.

Mode

The text in the Control Panel that says "Game Mode" or "StrategyMaster Mode" shows the current mode of CASINO PLANNER. From the **Options** menu, choose **Mode** to change setting.

Bet Amount and Type

Just to the right of the text in the control panel that displays the mode is a status box which helps you when betting on the crap table. As you move the curser over the table, this status box

\$10 Pass Line indicates the het amou

indicates the bet amount and bet type under the curser.

Dealer Captions

Just to the right of the text in the control panel that says "Shooter" is a status box which helps you follow

the action during the game. Captions describe what is happening here at all times.

Shooter Has the Dice

Hot/Cold Table IndicatorHot/Cold indicator

Just to the right of the IGS crap table is a thermometer. This "thermometer" shows how "hot" or how "cold" the table is, based on what has been happening on the Pass Line. Use this to vary your strategy for "hot streaks" or "cold" conditions at the table. This thermometer tracks what has been happening at the table for the last 30 simulated minutes.



The Player Animation is a second view of the IGS crap table located in the lower right hand corner of the main screen. This is the same view that the boxman has as he looks across the table toward the players (one of which is yourself).

The purpose of the Player Animation is to allow you to see up to 3 animated players and stickmen as the game is played. You can control how many players appear in the Player Animation and you can also decide which one of these players will be "you". The options for the Player Animation include:

- 1. From the **Options** menu, choose **General**.
 - a. In this dialog, you will see text "Player Animation". If the check box next this text is active then animated players and a stickman will be shown at the IGS crap table.
 - b. In this dialog, you will also see text "Number of Players". If you select "I am the only player" then only you and the stickman will be shown in the Player Animation view. If you select "Three players at table", then three players and the stickman will be displayed in the Player Animation view. Even though there can be three players, you are the only one that can make bets on the table. However, the dice are passed from player to player each time there is a new shooter.
- 2. From the **Options** menu, choose **Select Players**.

In this dialog box you can select from 12 different players to represent yourself. Each of the 12 players has their own mannerisms and personality. Suzy even smokes a cigarette, while others sip their drinks. When there are three players at the table the other two players are selected randomly by CASINO PLANNER.

In the Player Animation, you can watch the shooter roll the dice. The shooter will shake the dice and then throw them across the table. This happens at the same time the dice are moving across the IGS crap table at the top part of the screen. When the dice come to rest, the stickman will collect the dice and hold them. The stickman will put the dice in front of the shooter only after all bets have been

either collected or paid off, just like in a real casino.

Introduction

When using CASINO PLANNER, you can be in one of two modes -- Game Mode or StrategyMaster Mode. You can change from one mode to the other at any time, but this will cause a reset. From the **Options** menu, select **Mode** to change setting. The current mode of CASINO PLANNER is always displayed in the Control Panel located below the IGS crap table.

Game Mode

DEFINITION: *Game Mode*. All bets must be made <u>manually</u>, one roll at a time, just like you would in a real casino

This mode allows you to practice playing a strategy after you have found one you liked from the StrategyMaster mode. Therefore, you can play on your own as if you were at a real crap table for the benefit of preparing for a trip to a *real* casino.

StrategyMaster Mode

DEFINITION: *StrategyMaster Mode*. All bets are made <u>automatically</u> according to a predefined Betting Strategy that has been entered through the convenient "Make A Bet" window.

In the StrategyMaster Mode, CASINO PLANNER will *automatically* make ALL your bets as defined by a Betting Strategy that is saved in memory. StrategyMaster can simulate up to 20,000 consecutive sessions in a short period of time. After a simulation is completed, StrategyMaster will tally the results and provide you a wide range of important information about your Strategy. With this information you will be able to "fine tune" your Strategy for optimum performance (i.e. WinRating, Playtime, cost, etc.), or objectively compare it to other strategies.

Game Mode

How to Setup the Game Mode Game Mode Options How to Make a Bet How to Remove a Bet How to Roll the Dice Winning and Losing Comeout Roll Point Roll Using "Auto Correct Bet Amounts Using the Reset Button How to Speed Up the Pace of the game Wrapping Up

How to Setup the Game Mode

1. From the **Options** menu, choose **Mode**. A dialog box titled "Mode" will appear as shown below. Select Game Mode and type in a Starting Bankroll of 1000. Click **OK**. This will take you back to the IGS crap table.

{ewc D2HTools, D2H_256Color, help0018.bmp}

Game Mode Options

- 1. From the **Options** menu, choose **General**
 - a. Locate the "Animation Settings" box. Here you will see a check box called "Single step though results". If this check box is active then your losing bets will be removed from the table first, one bet at a time, and then your winning bets will be paid off, one bet at a time - just like a real casino. If this check box is not active then all losing bets will be removed and all winning bets will be paid off at the same exact time. Not activating this check box will significantly speed up the pace of the game.



Unlike a real casino, with CASINO PLANNER you can control the speed of the action at the table. To do this, there are two slide bars that control the pace of the game.

The slide bar called "**Roll results**" controls how fast CASINO PLANNER will cycle through the five roll results in the control panel. If you are interested in reading these five results after each dice roll then you will want to select a long delay for this slide bar. Otherwise, you will want this slide bar to be set at a slow delay of 0.1.

The slide bar called "**Between rolls**" controls how fast CASINO PLANNER will roll the dice when Auto Roll button has been clicked. Normally you will want this slide bar to be set at the shortest delay of 1. However, if you want to simulate a real casino which rolls the dice approximately every 30 seconds, you have this ability.

- b. Locate "**Player Animation**". If this check box is active, animated players will be seen at the table in the lower left portion of the main screen, otherwise, no players will be shown. It should be noted that if "Player Animation" is selected, the pace of the game will slow down due to the animation of the players.
- c. Locate "Auto correct the bet amounts" box. Certain bets on the IGS crap table need to be made discretely incremental amounts. For example, the Place 6 bet must be in increments of \$6. Let's say the Bet Rail contained \$7 and you clicked the mouse to make a Place 6 bet. If "Correct without prompts" is selected then \$7 from the Bet Rail would automatically adjust the \$7 to \$6. If "Correct with prompts" is selected then a message box would prompt you for a correct bet amount.
- 2. From the **Options** menu, choose **Casino**. Remember that CASINO PLANNER is specifically designed to prepare you for a winning trip to the casino. Part of preparing means practicing your strategy with the same payoff odds as the casino you are planning to visit. The "Setup Casino" dialog box allows you to set up all of the rules and payoff odds to match the real casino that you are about to play.

{ewc D2HTools, D2H_256Color, help0020.bmp}

CASINO PLANNER already has preloaded some of the more popular casinos in the United States. These casinos already have been setup with proper rules and payoffs. If the casino you are going to visit is not listed, you may click the "new" button and add new casinos to the list. If you do not know the payoff odds, you can call the casino and ask them to send you their "Gaming Guide" in the mail.

3. From the **Options** menu, choose **Sound Options.** While playing in the Game mode you can select up to four sound options. (Note: Must have sound card for this option.)

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- a. Speech This option enables or disables the stickman calling the game.
- b. **Sound Effects** These include dice sounds, sound of bet being removed from table, If your you lose on a given dice roll you will hear a cash register sound (sale), if you win on a given dice roll you will hear multiple chips being placed in the Bankroll Rail.
- c. **Crowd Sounds** In a real casino you will hear background sounds as you play, likewise CASINO PLANNER allows for this sense of realism as well.
- d. **Music** In a real casino you can hear music playing from the ceilings above, likewise CASINO PLANNER allows you to enjoy soothing MIDI music as you play, or by turning this option off you can load and play your favorite CD!

How to Make a Bet

To make a bet in a *real* casino you would take chips out of your bankroll, assembling them in your hand, until you have the amount you want. Then you would put those chips on the table. This method is very similar with CASINO PLANNER except that you must use the bet rail, not your hand, to assemble your bet before rutting it on the table.

before putting it on the table.	
Bankroll	Det Rall
Bankroll Amount	 Bet Rail Amount

How to take chips out of your Bankroll Rail and assemble them in the Bet Rail:

- 1. To add chips to the Bet Rail, use the left mouse button and click on the chip color in the Bankroll Rail that you would like to add to the Bet Rail. Each time you click the mouse on a chip color, it will be added to the Bet Rail.
- 2. To remove a chip from the Bet Rail, use the right mouse button and click on the chip color in the Bankroll Rail that you would like to remove from the Bet Rail. Each time you click the mouse on a chip color in the Bankroll Rail, it will be removed from the Bet Rail.
- 3. To remove all chips from the Bet Rail, use the left or right mouse button and click anywhere in the empty space just to the right of the chips in the Bankroll Rail.
- 4. An alternate way to assemble a bet in the Bet Rail is to highlight the Bet Rail amount which is represented by a number and directly type in the bet amount desired, then hit the TAB key.



5. Make a \$25 "Pass Line" bet by moving the cursor (hand) so that the "index finger" is over the upper 50% of the Pass Line area on the table and click with the *left* mouse button. You now have a \$25 Pass Line bet on the table.

Use this same procedure to make bets anywhere on the IGS crap table.

RULE: Use the *left* mouse button to manually make a bet on the IGS crap table.

How to Remove a Bet

To remove a bet on the IGS crap table simply move the cursor (hand) over the bet and click with the *right* mouse button. Try this by moving the cursor over the \$25 Pass Line bet and then click with the *right* mouse button. Now the bet is removed. Move the cursor over the Pass Line area and click with the *left* mouse button. The \$25 in the Bet Rail will now be on the Pass Line.

RULE: Use the *right* mouse button to remove a bet.

How to Roll the Dice

Now that that we have a \$25 Field bet on the table, we are ready to roll the dice. A pair of red dice can be found on the left side of the IGS crap table. There are three different ways to manually roll the dice.



1. Click on the one of the two dice with the *left* mouse button for a random roll.

Click on the one of the two dice with the *right* mouse button. A dialog box will pop up as shown below.



2.

Enter the dice number you want for the next roll. When you click OK the dice will be rolled with the number you have intructed.



button located in the Control Panel for a random roll.

Do not roll the dice yet.

3. Click on the "Roll Dice"

Winning and Losing

When you win, a stack of chips representing your winnings will "appear" next to your bet. After a brief moment, this stack will disappear. Where did it go? CASINO PLANNER assumes that you want to take down your winnings, not let it ride. Therefore, your winnings automatically go from the table straight into your bankroll. When you lose, your chips will be removed from the table.

The computer can payoff and remove bets faster than your eye can see. Therefore, CASINO PLANNER has two convenient sounds that will indicate whether you won or lost money for your for a given roll of the dice. If you net for a dice roll wins money, you will hear a bell sound. If your net for a dice roll loses money, you will hear a "cash register" sound.

Comeout Roll

The Comeout roll is the *first* roll of a new game. Notice the puck off to the side of the table (upper left) with the black side facing up. This means the next roll is a Comeout roll. On a Comeout roll, you will hear the dealer say "Coming out! Coming out!". Notice the "captions" box in the bottom-right corner of the screen below the Player Animation view. Whenever the dealer talks, words will appear in captions box. This box will keep you informed as to what is happening during the game.

Remember that on a Comeout roll, the Pass Line bet wins if 7 or 11 is rolled and loses if 2, 3 or 12 is rolled. For this example, click on the one of the two dice with the *right* mouse button. A dialog box will pop up. Enter "11" for the dice number and click OK. You will see the dice roll across the table and stop with "11" showing. CASINO PLANNER will put your winnings (\$25) next to your Pass Line bet just like in a *real* casino. After a moment, CASINO PLANNER will automatically move your winnings into the Bankroll Rail and leave your original \$25 Pass Line bet on the table, just like in a *real* casino.

Notice the puck is off to the side of the table (upper left) with the black side facing up. This means the next roll is still a Comeout roll. Click on the one of the two dice with the *right* mouse button. A dialog box will pop up. Enter "4" for the dice number and click OK. You will see the dice roll across the table and stop with "4" showing. Nothing happens to your Pass Line bet since all this roll did was establish the Point as "4".

Point Roll

Notice the puck has been moved on top of the number "4" with the white side facing up. This means the next roll is a Point roll. Remember on a Point roll, the Pass Line bet wins if the Point number is repeated (in this example, 4) before the 7 and loses if the 7 is rolled.

Before rolling the dice, lets make a \$50 double Free Odds bet. Notice the Bet Rail contains \$25. Therefore, in the Bankroll Rail click once on a green chip (\$25) with the *left* mouse button and you will see \$25 added to the Bet Rail. Now the Bet Rail contains \$50. To make a \$50 double Free Odds bet, simply move the cursor (hand) over the **lower 50%** of the Pass Line area and click with the left mouse button. The \$50 in the Bet Rail is now "behind" the original \$25 Pass bet as a Free Odds bet.



Again, click on the one of the two dice with the *right* mouse button. Enter "7" and click OK. You will see the dice roll across the table and stop with "7" showing. This time your Pass Line bet lost. CASINO PLANNER will remove your \$25 Pass Line bet as well as your Free Odds bet of \$50. Since "7" was rolled before the Point was repeated, the game ends and CASINO PLANNER moves the puck off to the side of the table signifying the next roll is a Comeout roll and thus the start of a new game.

Using "Auto Correct Bet Amounts

"Auto Correct Bet Amounts" can make it easier to make bets on the table. Let's look at an example that will make a \$25 Pass Line bet. After the point is established, the four inside Place numbers (5,6,8,9) will be made.

Since you lost on the last roll, you must manually make another \$25 on the Pass Line which is just what you would have to do at a real table. But, the Bet Rail contains \$50. Therefore, in the Bankroll Rail click once with the *right* mouse button on a green chip to reduce the Bet Rail by \$25. Or you can click the empty space just to the right of the chips in the Bankroll Rail to "clear" the Bet Rail and then click on a green chip in the Bankroll Rail with the *left* mouse button. The Bet Rail now contains \$25. Click on the **upper 50%** of the Pass Line area to transfer the \$25 in the Bet Rail on the table. Now you will see \$25 on the Pass Line.



Click on the one of the two dice with the *right* mouse button. Enter "4" and click OK. The dice will be rolled and 4 will be established as the Point. Notice the puck move on top of the "4". The next roll is a Point roll.

Now lets see how easy it is to bet \$22 across the four inside Place numbers. From the **Options** menu, choose **General**. In the lower right area of the dialog box you will see a box called "Auto correct the bet amounts". Select "Correct without prompts" and click OK.

Click the empty space just to the right of the chips in the Bankroll Rail to "clear" the Bet Rail and then click on a red chip in the Bankroll Rail with the *left* mouse button. The Bet Rail now contains \$5. Now using the left mouse button, click once on Place 5, Place 6, Place 8 and Place 9 bet areas of the table. Notice that the Place 4 and Place 9 bets have \$5 each and the Place 6 and Place 8 bets have \$6 each. Even though the Bet Rail contained \$5, CASINO PLANNER automatically corrected the Place 6 and Place 8 bets from \$5 to \$6 by rounding to the nearest \$6 boundary. This makes it allot *faster* and *easier* to make bets on the table without having to worry about the "exact" bet amount. \$5 is now on the Place 5 and Place 9. \$6 is on the Place 6 and Place 8. There is now a total of \$22 across the four inside Place numbers.

Auto correct the bet amounts

- > Correct without prompts
- Correct with prompts

Beginners may want to have "Auto correct the bets amounts" selected to "correct with prompts". Therefore, when an incorrect bet amount is made, CASINO PLANNER will prompt you with a pop-up window to notify you what is wrong with the bet amount and a suggest a proper amount.

Using the Reset Button

There are times when you are in the middle of a session and you would like to start the session over again. The Reset button will remove all bets from the table and re-establish your original Bankroll. Let's see how this works.



Click the Reset button located in the Control Panel. Notice your \$25 Pass Line bet and the \$22 across the inside Place numbers are gone. Also, your bankroll is back at its original amount of \$1,000. Now you are ready to start to play a new session.
How to Speed Up the Pace of the game

There are three controls that affect the time it takes between dice rolls. From the **Options** menu, choose **General**.

1. Locate the "Animation Settings" box. Here you will see a check box called "Single step though results". Make sure this check box is not active. Also, drag both slide bars to the far right to shorten delays to their minimum.



2. Locate "Player Animation" and make sure its check box is inactive. This will prevent any people animation when the game is played and thus speed up the time between rolls.

Wrapping Up

In the Game Mode, you have a lot of different options and about 40 different types of bets you can make. Use this mode to *practice* playing your Betting Strategy for preparation to a *real* casino.

StrategyMaster Mode

Going Where No Software Has Gone Before Introducing StrategyMaster Concept of a "Session" Payoff Odds to Match the Casino You're Visiting Basic Terminology Two Ways to Use StrategyMaster How to Setup the StrategyMaster Mode Two ways to begin a Strategy Basic Methods Example: How to Plan a Winning Trip to the Casino

Going Where No Software Has Gone Before

The most basic concept behind CASINO PLANNER is simple -- BE PREPARED when you go to the casino. CASINO PLANNER was conceived for this very reason. Now it is possible to:

- 1) Have an *objective* basis for testing and comparing countless crap strategies.
- 2) Evaluate a *single* crap Strategy under many different Money Management conditions.
- 3) Use your home personal computer to *dramatically* increase your chances of winning at a *real* casino. You will even learn how to have WinRatings of greater than 50%.

Introducing StrategyMaster

DEFINITION: *StrategyMaster*. A powerful planning tool that provides a wide range of important information about countless crap strategies for the sole purpose of dramatically increasing your chances of winning at a real casino.

A StrategyMaster Guide, shown below, illustrates how easy StrategyMaster is to use. First, you choose a crap Strategy that you would like to try out. Second, you enter your Money Management numbers which defines the limits for your session at the table. This includes starting Bankroll, Win Goal, Loss Limit and Time Limit. Third, you enter the bets for your Strategy through a convenient window. Next, you run StrategyMaster. In the matter of minutes StrategyMaster tallies the results and provides you a wide range of important information that will give you a clear, overall picture of just how your Strategy performs.



Not only can you use StrategyMaster to gain valuable insight for <u>one</u> Strategy, but you can also use StrategyMaster to objectively compare crap strategies in order to determine which ones are better.

Concept of a "Session"

DEFINITION: *Session*. The period of time from when you step up to the table, buy-in for your chips, and play a Betting Strategy until you reach your Win Goal, Loss Limit or Time Limit.

RULE: Each session much be played with *one* Strategy.

An important part of winning is understanding the concept of a session. Whenever you play craps, your time at the table is referred to as a session. A session begins when you step up to the table and buy-in for chips. This is your starting bankroll. You play a predefined Betting Strategy until you either hit your win goal, loss limit or time limit. Everything is planned out for your session and *nothing is left to chance*.

Remember, StrategyMaster is based on simulating thousands of *sessions* at the table to give you a clear, overall understanding of how your Strategy will perform in "real-world" situations. Hence, when it's time for a real *session* at the casino, you can play just like you did with StrategyMaster.

Payoff Odds to Match the Casino You're Visiting

Different casinos can have different payoff odds for certain bets on the table (i.e. Field bet, Yo bet, Any 2, Any 12, etc.) Therefore, it is important that the payoff for CASINO PLANNER match the payoff odds for the casino you plan to visit. This will ensure that StrategyMaster will accurately predict what can happen during your next trip to the casino.

From the **Options** menu, choose **Casino**. The "Setup Casino" dialog box will appear as shown below.



CASINO PLANNER already has preloaded some of the more popular casinos in the United States. You can select one from a list located in the upper left part of the dialog. These casinos already have been setup with proper rules and payoffs. Be careful not to change the settings of a "preset" casino, because if you do, they will be saved when you exit the dialog. If the casino you are going to visit is not listed, you may click the "new" button and add new casinos to the list. If you do not know the payoff odds, you can call the casino and ask them to send you their "Gaming Guide" in the mail.

Basic Terminology

Before we go over some examples on how to setup and run StrategyMaster, it is important to review some basic terminology that is used throughout this manual.

DEFINITION: *Simulation*. StrategyMaster plays your Strategy automatically until a predefined number of sessions at the IGS crap table is completed.

DEFINITION: *Strategy*. A generic term that refers to a "Betting Strategy" that is played under Money Management constaints.

DEFINITION: *Money Management*. Defines starting Bankroll, Win Goal, Loss Limit and Time Limit for a given session at the crap table.

DEFINITION: *Betting Strategy*. This A consistent way of betting which defines the types of bets to make, for how much and when to make them for a given session at the crap table.

DEFINITION: *New Betting Strategy*. A new Betting Strategy will be created if one or more of the following occurs to an existing Betting Strategy: 1) Bet type (Pass, Buy, Field, etc.) is changed, 2) Amount of bet is changed, or 3) the time at which a bet is to be made is changed.

Therefore, be careful when you see the two words "Strategy" and "Betting Strategy". The word "Strategy" alone is meant to refer to the <u>entire</u> Strategy, including both Money Management numbers and a Betting Strategy. "Betting Strategy" is meant to refer to <u>only the bets</u> of a given Strategy and DOES NOT include Money Management.

Two Ways to Use StrategyMaster

StrategyMaster will help you to dramatically improve your chances of winning for your next session at a crap table. There are two ways to use StrategyMaster:

Related Topics:

1. Objectively compare different Betting Strategies

2. "Fine-tune" one Betting Strategy

1. Objectively compare different Betting Strategies

This is where you begin with StrategyMaster. All Betting Strategies, no matter how good they are, will eventually produce profits for the casino, at your expense. Therefore, a superior Betting Strategy is one that keeps your losses down to a minimum over time. CASINO PLANNER has a unique feature called NET-per-Hour, to indicate what your *expected* losses should be.

DEFINITION: *NET-per-Hour*. The amount of money you can *expect* to lose, over time, for every hour that a particular Betting Strategy is played. (i.e. NET-per-Hour = "expected cost")

RULE: The NET-per-Hour is the *only* means that can be used to objectively compare Betting Strategies in order to determine which one is superior.

OBSERVATION: When comparing Betting Strategies, the one with the lower NET-per-Hour (with five-star rating) will be *always* be superior, no matter what Money Management numbers are used in the future.

2. "Fine-tune" one Betting Strategy

Once you have compared various Betting Strategies and found one with a low NET-per-Hour, then you are ready to "fine-tune" its performance.

DEFINITION: *Fine-tune*. To adjust the Money Management numbers in such a way that a Betting Strategy will yield a desired performance. (i.e. chances of winning, length of playtime, money required to play, etc.)

Your Money Managementnumbers directly effect how long you can expect to play, what your chances are of winning, how much money you will need to play your strategy, and other important aspects of your Betting Strategy. You will see that by adjusting the Money Management numbers, you can dramatically effect the Fundamental Five, Highs and Lows, and Averages for your Betting Strategy. Also, fine-tuning <u>one</u> Betting Strategy plays a *bigger* role in what can happen during your next trip to the casino, than switching over to a different Betting Strategy. In other words, most Betting Strategies offer a good chance for you to win, but it is your Money Management numbers that are *paramount* in being able to walk away from the table a winner. A bad Betting Strategy can be helped by proper Money Management numbers, but a good Betting Strategy can not be helped with bad Money Management numbers.

How to Setup the StrategyMaster Mode

From the **Options** menu, choose **Mode**. A dialog box titled "Mode" will appear as shown below. Select StrategyMaster Mode. Click **OK**. This will take you back to the IGS crap table

Two ways to begin a Strategy

There are two ways to begin working with a strategy before running StrategyMaster:

Related Topics:

1. Create a new Strategy from scratch

2. Open a Strategy that has been previously saved

1. Create a new Strategy from scratch

This is done by going to the **File** menu and choosing **New**. This will open the "Money Management" window where you will give your Strategy a brief description and setup your Money Management numbers for your session. You must then enter your Betting Strategy.

2. Open a Strategy that has been previously saved

This is done by going to the **File** menu and choosing **Open**. From here you can pick from a list of available strategies that already have Money Management numbers and a Betting Strategy. They are all setup and ready to be run by StrategyMaster or you can modify one of these strategies and save it under a different name.

Basic Methods

The following shows the basic ways in which you can use StrategyMaster .

Related Topics:

How to Setup and Run StrategyMasterHow to Compare Betting StrategiesHow to Use the "Money Management AssistantHow to Look at the Results While You Wait!How to Improve the ResultsImproving Your WinRatingIncreasing Your PlaytimeMinimizing Your Cost to PlayHow to Obtain WinRatings of Greater than 50%

How to Setup and Run StrategyMaster

- 1. From the **File** menu, choose **New**. The "Money Management" dialog box will appear. This is where you will always begin to setup a new Strategy.
 - a. Give your Strategy a short name under "Strategy Description".
 - b. Enter your Money Management numbers for Win Goal, Loss Limit, and Time Limit.
 - c. Click **OK**. This will take you back to the IGS crap table.
- 2. From the **Options** menu, choose **StrategyMaster**. The "StrategyMaster Options" dialog box will appear. Enter a value for "Number of Sessions per Run".
- 3. From the **StrategyMaster** menu, choose **Setup Bets**, then **Bets** (or click "Betting Strategy" button located below the IGS crap table). The "Betting Strategy" dialog box will appear.
 - a. Click on the check box for a bet that is part of your Betting Strategy. The "Make A Bet" dialog box will appear.
 - b. Enter the aspects about this bet to match your Betting Strategy (bet amount, when to make the bet, etc.).
 - c. Click OK. The "Betting Strategy" dialog box will appear again.
 - d. Repeat steps 1b through 3c until your Betting Strategy is completely entered.
- 4. From the **StrategyMaster** menu, choose **Run**, then **Go** (or click "Run" button located below the IGS crap table). CASINO PLANNER will now shrink down to an icon for maximum speed as shown

below: r creent completed Time completed of StrategyMaster run. of current sessible; being run.

StrategyMaster will stay an icon during the entire simulation. When StrategyMaster is completed, a small pop up will say "StrategyMaster is Finished". Click **OK** and the Overall Results window will automatically be displayed with all the important information about your Strategy.

5. You can accept these results, or go back and modify your Strategy by repeating steps 3 and 4.

How to Compare Betting Strategies

A very important part of planning a successful trip to the casino is being able to try out AND compare various Betting Strategies that are of interest to you. There are countless Betting Strategies in the game of craps and it is NOT obvious which ones are better than others. StrategyMaster provides an easy solution to this age old problem by allowing you to objectively compare Betting Strategies based on their "NET-per-Hour".

Just like in coin flipping you can *expect* heads to show up 50% <u>over time</u>, the NET-per-Hour also represents a consistent number <u>over time</u> that is practical for objectively comparing Betting Strategies *based on expected cost*. Obviously you will want to play a strategy with a low cost. The NET-per-Hour can be found in the Overall Results window located under the **StrategyMaster** menu.

For short simulations, the NET-per-Hour can be erratic and even produce non-negative results. Even though this really happens in "real world" situations over short periods of time, you need a *stable* NET-per-Hour for comparing Betting Strategies. In order to obtain stable results for the NET-per-Hour, it is recommended that you run StrategyMaster long enough to have an accuracy rating of "five-stars.

OBSERVATION: Money Management numbers have *no effect* on the NET-per-Hour.

RECOMMENDATION: To obtain a minimal "five-star" rating for NET-per-Hour, set the Money Management numbers to match the dialog box shown below and set the "Number of Sessions per Run" to 1000.

OBSERVATION: To obtain *maximum* accuracy for NET-per-Hour, set the Money Management numbers to match the dialog box shown below and set the "Number of Sessions per Run" to 20000. However, keep in mind that the simulation time will probably exceed 20 hours using a 90MHz Pentium PC.

{ewc D2HTools, D2H_256Color, help0035.bmp}

To access the Money Management Dialog, go to the **StrategyMaster** menu, choose **Setup Strategy**, then **Money Management**. To access the dialog box to change the "Number of Sessions per Run", go to the **Options** menu and choose **StrategyMaster**.

By allowing all sessions to end only by reaching the Time Limit, your strategy will run "wide open", *with very little interruption*. The above Money Management numbers will give a total PLAYTIME of 40,000 hours and thus meet the requirement to have a "five-star" rating. With these Money Management numbers, only the NET-per-Hour and VigRating will have meaning in the Overall Results window. But that's all right, since in objectively comparing two Betting Strategies, the NET-per-Hour is the *only* number that you are interested in.

Only in "fine-tuning" <u>one</u> strategy, will all the other information in the Overall Results window become important. Once you start "fine-tuning" a Betting Strategy, the NET-per-Hour is no longer important since it is already known from a previous run and since the Money Management numbers have no effect the NET-per-Hour. Use the following procedure to obtain a stable NET-per-Hour when comparing Betting Strategies:

- 1. From the File menu, choose New. The "Money Management" dialog box will appear.
 - a. Give your Strategy a short name under "Strategy Description".
 - b. Enter your Money Management numbers as follows:

Win Goal = 1000000 (one million dollars)

Loss Limit = 1000000 (one million dollars)

Time Limit = 40

Click **OK**. This will take you back to the IGS crap table.

2. From the Options menu, choose StrategyMaster. The "StrategyMaster Options" dialog box will

appear. Enter 1000 for "Number of Sessions per Run".

- 3. From the **StrategyMaster** menu, choose **Setup Bets**, then **Bets** (or click "Betting Strategy" button below the IGS crap table). The "Betting Strategy" dialog box will appear.
 - a. Click on the check box for a bet that is part of your Betting Strategy. The "Make A Bet" dialog box will appear.
 - b. Enter the aspects about this bet to match your Betting Strategy.
 - c. Click OK. The "Betting Strategy" dialog box will appear again.
 - d. Repeat steps 3a through 3c until your Betting Strategy is completely entered.
- 4. From the StrategyMaster menu, choose Run, then Go (or click "Run" button below the IGS crap table). CASINO PLANNER will now shrink down to an icon for maximum speed and run until StrategyMaster has finished the simulation. When StrategyMaster is completed, a small pop up will say "StrategyMaster is Finished". Click OK and the Overall Results window will automatically be displayed. The "NET-per-Hour" will now indicate your expected cost to play your Strategy. Ignore all other information in this window since they have no meaning with this type of run.

How to Use the "Money Management Assistant

- 1. From the File menu, choose New. The "Money Management" dialog box will appear.
 - a. Give your Strategy a short name under "Strategy Description".
 - b. Ignore the Money Management numbers for now.
 - c. Click OK. This will take you back to the IGS crap table.
- 2. From the **Options** menu, choose **StrategyMaster**. The "StrategyMaster Options" dialog box will appear. Enter a value for "Number of Sessions per Run".

RECOMMENDATION: Always set "Number of Sessions per Run" to 100 when using the Money Management Assistant.

- 3. From the **StrategyMaster** menu, choose **Setup Bets**, then **Money Management**. The "Money Management" dialog box will appear.
 - a. Click on the "Money Management Assistant" button. CASINO PLANNER will now shrink down to an icon for maximum speed and run until StrategyMaster has finished the simulation. When StrategyMaster is finished, the "Money Management" dialog box will re-appear with *updated* Money Management numbers for Win Goal and Loss Limit. These numbers provide a "good starting point" for your Betting Strategy.
 - b. Click OK. This will take you back to the IGS crap table.
- 4. From the StrategyMaster menu, choose Run, then Go (or click "Run" button located below the IGS crap table). CASINO PLANNER will now shrink down to an icon again for maximum speed and run until StrategyMaster has finished the simulation. When StrategyMaster is completed, a small pop up will say "StrategyMaster is Finished". Click OK and the Overall Results window will automatically be displayed with all the important information about your Strategy.
- 5. You can accept these results, or see "How to fine-tune" a Betting Strategy.

How to Look at the Results While You Wait!

A StrategyMaster run can take a long period time before a simulation is finished, depending on how you setup StrategyMaster. During a simulation, CASINO PLANNER will stay iconized until all the sessions of the simulation are completed. While you are waiting for StrategyMaster to finish, you can open and run other games or applications.

- 1. To do this, simply go to the Program Manager and open any application or game you want. While you are using these other programs, StrategyMaster while still be running in the background. When StrategyMaster is finished, you will automatically be notified.
- 2. Or, instead of running another program, there is something that might be more interesting to do while you wait. You can look at the results as they are being updated by StrategyMaster. To do this, click *once* on the CASINO PLANNER icon to bring up a pop-up menu. By selecting **Restore**, the IGS crap table will appear.

SHORTCUT: Instead of clicking once on the CASINO PLANNER icon to bring up a pop-up menu, you can double click on the icon to *directly* bring up the IGS crap table.

RULE: You can *abort* while in the middle of a simulation. When CASINO PLANNER is iconized, double click on the icon to bring up the IGS crap table and click on the "STOP" button. Now you are back in control of CASINO PLANNER.

Here you will see the main screen updating as StrategyMaster is running real time. Notice in the lower right hand corner of the window text that says "X.X% Complete" indicating how much of the simulation that StrategyMaster has completed.

- 3. There are alot of different things you can do while you are waiting for StrategyMaster to complete the simulation. Now lets look at the results window. From the **StrategyMaster** menu, choose **Results** then choose **Overall**. You should now see the **Overall Results** window appear. Here you watch all the important information about your strategy update while you wait. Notice in the lower left portion of the window text that says "% Session Completed" indicating how much of the simulation that StrategyMaster has completed.
- 4. Click OK button in the Results window. This will take you back to the IGS crap table and you will again see the screen updating. If you didn't like the looks of the results or you just want to stop the simulation, you can prematurely stop StrategyMaster. To do this, click the Stop button located in the Control Panel below the IGS crap table. Notice the Stop button turns into a Run button. At this point you may do what ever you want (i.e. modify the strategy, open a new startegy, exit CASINO PLANNER, etc.). For this example, just click the Run button so that StrategyMaster can continue to complete the simulation.
- 5. There are other things you can do while you wait. From the **StrategyMaster** menu, choose **Results** then choose **Bankroll Graph**. You should now see the the "Session Bankroll Graph" appear in the lower right side of the screen as shown below.



This graph shows how your bankroll changes for each session as the simulation is running. This graph is actually a resizable window. Therefore, you can treat it as any other window and move it around, expand it and resize it.

6. All these graphics are nice to watch but it slows down StrategyMaster. To have StrategyMaster run full speed again, it must be shrunk back to an icon. To do this, go to the upper right most part of the IGS crap table window and click the "minimize" button (all windows have a minimize button in upper right corner to shrink the window into an icon). Now you will see CASINO PLANNER again as an icon.

OBSERVATION: When CASINO PLANNER is iconized, maximum speed for the simulation will be obtained. On the Contrary, when CASINO PLANNER is NOT iconized, the simulation will slow down considerably since time must be spent updating the graphics.

RECOMMENDATION: After StrategyMaster has run for a while, take a peek at the results to see how they're doing. If the results look good then shrink CASINO PLANNER back to an icon for maximum speed, if the results look real bad, abort the StrategyMaster run altogether.

How to Improve the Results

If you like <u>one</u> Betting Strategy (i.e. \$5 Pass with double odds) but you are not happy with the results, you can adjust the Money Management numbers to improve your Strategy. The following shows how to adjust the *Money Management* numbers to get the type of results you are looking for:

Improving Your WinRating

You can increase your WinRating by doing one or more of the following:

- 1) Decrease your Win Goal.
- 2) Decrease your Time Limit.
- 3) Increase your Loss Limit.

NOTE: By doing the opposite of the above, you can decrease your WinRating.

Increasing Your Playtime

You can increase your playing time by doing one or more of the following:

- 1) Increase your WinGoal.
- 2) Increase your Time Limit.
- 3) Increase your Loss Limit.

NOTE: By doing the opposite of the above, you can decrease your Playtime.

Minimizing Your Cost to Play

There are actually two types of costs that should be taken under consideration when evaluating the results from a StrategyMaster run:

- 1. The *expected* cost to play a <u>session</u> at the table. This is the "NET-per-Session" which is part the Fundamental Five. You can <u>decrease</u> your *expected* session costs by doing one or more of the following:
 - 1) Decrease your WinGoal.
 - 2) Decrease your Time Limit.
 - 3) Decrease your Loss Limit.

By doing the opposite of the above, you will increase your average session costs.

OBSERVATION: The lower your expected "NET-per-Session", the lower your expected "Playtime per Session" and vice-versa.

- The *expected* cost to play each <u>hour</u> at the table. The is the "NET-per-Hour" listed in the Overall Results window. Changing the Money Management will not affect "NET-per-Hour". Instead, the only way <u>decrease</u> the "NET-per-Hour" is to change your Betting Strategy. You can do this by doing one or more of the following:
 - 1) Decrease your bet amounts.
 - 2) Change bet types (i.e. Hardways, Field, etc.) to ones that have lower vigs or eliminate them altogther from your Betting Strategy.

How to Obtain WinRatings of Greater than 50%

For a given session at the table, if you are willing to risk more money than you are willing to win, you can actually have the <u>odds of winning in your favor</u> over the casino (i.e. WinRating of greater than 50%). No matter what your Betting Strategy is, use Money Management numbers that have a Loss Limit *greater* than your Win Goal and try to make sure that your sessions don't reach their Time Limit. In other words, your sessions should end by either reaching your Win Goal or Loss Limit. If your Loss Limit is about ten times higher than your Win Goal, you can actually achieve WinRatings of around 90%.

You will see that your WinRating is independent of the amount of money you want to win. In others words, you can have, for example, an 85% chance to win **any amount of money you want**. It all depends on how much you are willing to risk. Let's look at two players who are both betting the Pass Line only. "Player A" wants to have an 85% chance of winning \$100, and "Player B" wants an 85% chance to win \$1000. There are many Strategies that would have solutions for both to get what they want. A solution for each player is given below:

	Amount on Pass Line	Win Goal	Loss Limit	Time Limit	WinRating
"Player A"	\$100	\$100	\$700	3 hrs.	85%
"Player B"	\$1000	\$1000	\$7000	3 hrs.	85%

RECOMENDATION: When trying to achieve a high WinRating, set the Time Limit to 40 hrs so that you will not prematurely end a session. Next, set your Loss Limit between five and ten times greater than your Win Goal, and run StrategyMaster. When completed, note your maximum Playtime listed under "Highs and Lows" to see if it is within a reasonable period of time (i.e. not greater than five or six hours).

Example: How to Plan a Winning Trip to the Casino

StrategyMaster is meant to be used by ANYONE who is going to the casino. Let's go over some <u>practical</u> issues that all crap players face. Let's say you are going to the casino this weekend and you're <u>not sure</u> which Betting Strategy to use and how much money to bring, etc. This example will illustrate how simple it is to use CASINO PLANNER to prepare for a winning trip to the casino. It's as easy as 1-2-3!!!



FLOW DIAGRAM: How to Plan a Winning Trip to the Casino

- Step 1 Compare different Betting Strategies that are of interest to you and choose the one with the lower NET-per-Hour.
- Step 2 For the <u>one</u> Betting Strategy that you have selected, use the Money Management Assistant to help you with a "good starting point" for your Money Management numbers (i.e Win Goal and Loss Limit).
- Step 3 Fine-tune your Betting Strategy simply means adjusting the Money Management numbers in order to get the results you are looking for (i.e. WinRating, playtime, cost, etc.).

Let's go to the casino!

Related Topics:

Step 1 - Comparing Different Betting Strategies

Step 2 - Using the Money Management Assistant

Step 3 - Fine-tuning Your Strategy

Step 1 - Comparing Different Betting Strategies

Which of the following two Betting Strategies is better? In other words, which one has a lower *expected* cost?

- 1. Betting Strategy A:\$10 Pass bet w/\$20 double odds
- 2. Betting Strategy B: \$12 Place 6 and \$12 Place 8 on Point rolls only

(Note that during the course of a game, "Strategy A" is betting a total of \$30, while "Strategy B" is betting \$24.)

It's not obvious which strategy is better. "Strategy A" is the popular Pass bet with double odds. "Strategy B" takes advantage of the frequent rolls of 6 & 8 and combines this with low vig bets like the Place 6 and Place 8. There are five ways to roll a 6 and five ways to roll an 8. On the other hand, there are six ways to roll a 7. Therefore, "Strategy B" has ten ways to win and six ways to lose. That's almost a 2:1 chance of winning with either the Place 6 or Place 8. Not a bad strategy.

So which one is better, "Strategy A" or "Strategy B"? The only way to know is to compare the NET-per-Hour for each of the two Betting Strategies. For obvious reasons, the one with the lowest NET-per-Hour is the better of the two.

Setting Up "Strategy A"

(Recall section titled, "How to Objectively Compare Betting Strategies")

- From the File menu, choose New. The "Money Management" dialog box will appear. In the Strategy Description box, type "\$10 Pass w/double Odds". Enter a Win Goal = 1000000, Loss Limit = 1000000 and Time Limit = 40. Click OK. This will take you back to the IGS crap table.
- 2. From the **StrategyMaster** menu, choose **Setup Bets** then choose **Bets**. The "Betting Strategy" dialog box will appear. This dialog box has over 40 check boxes that represent all individual crap bets on the table.

SHORTCUT: A quicker way to bring up the "Betting Strategy" dialog box is to click on the "Betting Strategy" button located in the Control Panel below the IGS crap table.

- 3. Click on the check box just to the left of the word "Pass". The "Make A Bet on the Pass Line" dialog box will appear. Type in a **Fixed Bet** amount of \$10.
- 4. Click on the Free Odds button. The "Make A Bet on the Pass Line Odds" dialog box will appear. Select "double odds" for when the point is "4 or 10", "5 or 9" and "6 or 8". Your Free Odds bet will be \$20 no matter what the point is. Click OK. This will take you back to the "Make A Bet on the Pass Line" dialog box. Click OK. This will take you back to the IGS crap table.
- 5. Next, you must setup the total number of sessions that you want StrategyMaster to simulate. It is from these simulations that StrategyMaster will tally the results for your Strategy.

From the **Options** menu, choose **StrategyMaster**. The "StrategyMaster Options" dialog box will appear. Type in 1000 for the Number of Sessions. Click **OK**. This will take you back to the IGS crap table.

Running StrategyMaster to Obtain the Results

 StrategyMaster knows your Betting Strategy and number of sessions to simulate. Now, you are ready to run StrategyMaster to see how the strategy will perform. Click on the **Reset** button located below the IGS crap table, then click on the **Run** button. CASINO PLANNER will shrink down to an icon for maximum speed as shown below.



of StrategyMaster run.

2. StrategyMaster will stay iconized until all 1000 sessions of the simulation are completed. The icon will indicate percent complete as StrategyMaster is running. As soon as the simulation is complete, you will see a small window appear as shown below.

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3. Click **OK**. You will see the **Overall Results window** appear with <u>similar</u> results to the one shown below.

{ewc D2HTools, D2H_256Color, help0040.bmp}

The only results that have any meaning in the Overall Results window for this type of simulation is the NET-per-Hour and VigRating. For purposes of objectively comparing Betting Strategies, all you need to do is write down the the NET-per-Hour for future comparison. . (Notice the VigRating is 0.61%. This happened to be *exactly* the ideal value of 0.61%. Normally the simulation will give a result very close to its ideal value.)

4. To save this Betting Strategy, go to the **File** menu and choose **Save**. In the dialog, give your strategy a file name "strat_a.wc1. Click **OK**. This will take you back to the IGS crap table.

Setting Up "Strategy B"

The procedure to obtain the NET-per-Hour for "Strategy B" is the same as for "Strategy A".

- Instead of going to the File menu and choosing New, let's look at another way to to setup a strategy. From the StrategyMaster menu, choose Setup Bets then choose Money Management. The "Money Management" dialog box will appear. In the Strategy Description box, type "\$12 Place 6 and 8 on Point rolls". Leave the Money Management numbers for Win Goal, Loss Limit and Time Limit the same as from "Strategy A". Click OK. This will take you back to the IGS crap table.
- 2. From the StrategyMaster menu, choose Setup Bets then choose Bets. The "Betting Strategy" dialog box will appear. The check box just to the left of the word "Pass" and the check box just to the left of the word "Take Odds" will both alraedy be active from the previous run. Click on the active check box next to "Pass". The "Make a Bet on the Pass Line" dialog box will appear. De-select the check box for "Computer Controlled Bet" to quickly disable the Pass bet, as well as, its free odds. Click OK. This will take you back to the Betting Strategy Dialog box.
- 3. Click on the "Place 6" check box. The "Make A Bet on Place 6" dialog box will appear.

A. Type in a "Fixed Bet" amount of \$12.

B. Under Conditional Betting, select "Point Rolls Only". Make sure that all check boxes are active for each Point, except for when the Point is 6

Click OK. This will take you back to the Betting Strategy Dialog.

- 4. Click on the "Place 8" check box. The "Make A Bet on Place 8" dialog box will appear.
 - A. Type in a "Fixed Bet" amount of \$12.
 - B. Under Conditional Betting, select "Point Rolls Only". Make sure that all check boxes are active for each Point, except for when the Point is 8.

Click **OK**. This will take you back to the Betting Strategy Dialog. Click **OK** again. This will take you back to the IGS crap table.

5. (1000 sessions is already set for "Number of Sessions per Run" from the previous simulation.)

Running StrategyMaster to Obtain the Results

- StrategyMaster knows your Betting Strategy and number of sessions to simulate. Now, you are ready to run StrategyMaster to see how this strategy will perform. Click on the **Reset** button located below the IGS crap table, then click on the **Run** button. CASINO PLANNER will shrink down to an icon for maximum speed.
- StrategyMaster will stay iconized until all 1000 sessions of the simulation are completed. The icon will indicate percent complete as StrategyMaster is running. As soon as the simulation is complete. Once complete, click OK on pop-up window that says "StrategyMaster is Finished!". You will see the Overall Results window appear with similar results to the one shown below.

Strategy Master RESULTS for	\$12 Place 6 and 8 on Point rolls						
The Fundamental Five™ for your strategy:							
1. WinRating TM = 29.00% +- 5 pts 2. WinGoal Rating TM = 0.00% 3. Avg. PLAYTIME = 40:00 4. Avg. NET-per-Session = \$ 5. VigRating TM = 1.59% Under the following Bankroll WinGoal Loss Limit conditions: \$200000 \$100000 40 hours							
The Accuracy of these Results is : ***** Excellent							
HIGHS AND LOWS	AVERAGES						
Most ever AHEAD = \$ 2014 Most ever DOWN = \$ -3382 PLAYTIME (Hr:Min) MIN MAX Winning Sessions = 40:00 40:01 Losing Sessions = 40:00 40:01	Winning Sessions = \$ 498.29 (Hrs:Min) = 40:00 Losing Sessions = \$ 759.31 (Hrs:Min) = 40:00 NET-per-Hour = \$ -9.86 Diag Polls = 4801						
TOTALS							
<pre># Winning Sessions = 290 Sessions Completed = 1000 %Sessions Completed = 100.00% Total Dice Rolls = 4800758 Dice Accuracy = 99.91%</pre>	Total Winnings = \$13139112 Total money Bet = \$24795816 Total Markers Taken = \$ 0 NET(Total Ahead/Down)= \$ -394608 Total PLAYTIME = 40006:19						
Sessions	Print Print						

The only results that have any meaning in the Overall Results window for this type of simulation are the NET-per-Hour and VigRating. For purposes of comparing Betting Strategies, all you need to do is write down the the NET-per-Hour for future comparison. (Notice the VigRating is 1.59%). This is very close to the ideal value of 1.52%)

4. To save this strategy, go to the **File** menu and choose **Save**. In the dialog, give your strategy a file name "strat_b.wc1. Click **OK**. This will take you back to the IGS crap table.

Conclusion

The results from all four StrategyMaster runs are shown below:

Strategy A => Expected NET-per-Hour = -\$5.04/hr

Strategy B => *Expected* NET-per-Hour = -\$9.86/hr

It is now evident that Strategy A is *much better* than Strategy B.

Step 2 - Using the Money Management Assistant

Now you've determined which Betting Strategy you will use, it is now time to determine which Money Management numbers you should use. Your Money Management numbers will play an important role in answering the following questions:

- 1. How much Money should you bring to play your strategy?
- 2. What is a realistic Win Goal for your strategy?
- 3. How do you determine a "worst case" Loss Limit?
- 4. How much **Playtime** can you expect at the table?

These are important questions that every player should have answers to before stepping up to the crap table. This is where the Money Management Assistant can help in a big way. For a given Betting Strategy, the Money Management Assistant will automatically give you a "good starting point" for a realistic Win Goal, Loss Limit and Bankroll needed to play your strategy. But what is meant by a "good starting point"?

OBSERVATION: There is no one set of Money Management numbers that is ideal for all players.

The Money Management Assistant cannot give you one set of *ideal* Money Management numbers because there are many different types of players. For example, lets look at two players, Mr. Aggressive and Mr. Conservative. Both players will be betting the exact same way (i.e. \$10 Pass Line w/double Free Odds). Mr. Aggressive wants to win a lot of money and is willing to accept high risk. Mr. Aggressive will require **one** set of Money Management numbers. Mr. Conservative on the other hand, is willing to accept smaller winnings at a lower risk. Hence, Mr. Conservative will have a **different** set of Money Management numbers from Mr. Aggressive -- even though their Betting Strategy is the *same* (i.e. \$10 Pass Line w/double Free Odds).

Since there is no one set of Money Management numbers for everyone, the Money Management Assistant splits right down the middle to give you Money Management numbers that are neither super aggressive nor very conservative. That way, no matter what kind of player you are, there will be only a slight adjustment to the Money Management numbers. But before you can adjust the Money Management numbers, you must *first* have a "good starting point".

You only need to use the Money Management Assistant <u>once</u> for each new Betting Strategy that you create. After the Money Management Assistance gives you a "good starting point", it's up to you to fine-tune the Money Management numbers until the results in the Overall Results window matches what you are looking for. (i.e. high WinRating, long Playtime, low cost, etc.)

Setting Up the Strategy

- 1. From the File menu, choose Open. Select the file called "Strat_a.wc1".
- 2. Before using the Money Management Assistant you must setup the total number of sessions that you want StrategyMaster to simulate. It is from these simulations that StrategyMaster will provide your Money Management numbers.

From the **Options** menu, choose **StrategyMaster**. The "StrategyMaster Options" dialog box will appear. Type in 100 for the "Number of Sessions per Run".

RECOMMENDATION: When using the Money Management Assistant, 100 sessions per run is all that is needed to give reasonable Money Management numbers.

Click **OK**. This will take you back to the IGS crap table.

3. StrategyMaster knows your Betting Strategy and number of sessions to simulate. Now you're now ready to use the Money Management Assistant.

From the **StrategyMaster** menu, choose **Setup Bets**, then choose **Money Management**. The "Money Management" dialog box will appear.

Before running the Money Management Assistant, StrategyMaster must know the Time Limit for your Strategy. For this example, type in 3 hours. The Bankroll, Win Goal and Loss Limit numbers do not matter at this point since these numbers will be overriden by the Money Management Assistant.

Running the Money Management Assistant

- 1. Click on the "Money Management Assistant" button. CASINO PLANNER will now shrink down to an icon to obtain maximum speed.
- 2. StrategyMaster will stay iconized until all 100 sessions of the simulation are completed. The icon will indicate percent complete as StrategyMaster is running. As soon as the simulation is completed, you will automatically see the "Money Management" window appear with *similar* results as shown below.

Money Management					
Strategy Description File name					
Pass w/double Free Odds -					
Session Limits					
Money Management Assistant					
BankrollWinGoalLoss LimitTime Limit\$ 480\$ 215\$ 2403hrs					
V OK X Cancel Y Help					

Notice that StrategyMaster has *updated* the Money Management numbers in the dialog. The Win Goal and Loss Limit numbers in this dialog box were updated by StrategyMaster to give you about a 50% WinRating for your Betting Strategy, in this case, \$10 on the Pass Line with \$20 double Odds.

Click **OK**. Double click on the CASINO PLANNER icon to bring back the IGS crap table. (The icon is on top of your Windows wall paper)

Running StrategyMaster to Obtain the Results

 In order to obtain fairly accurate results, and at the same time, not take too long to run, you should change the "Number of Sessions per Run" to at least 1000. From the **Options** menu, choose **StrategyMaster**. The "StrategyMaster Options" dialog box will appear. Type in 1000 for the Number of Sessions per Run.

Click OK. This will take you back to the IGS crap table.

- Now you are ready to run StrategyMaster with the new numbers from the Money Management Assistant. Click on the Reset button located in the Control Panel below the IGS Crap table, then click on the Run button. CASINO PLANNER will shrink down to an icon for maximum speed.
- 3. StrategyMaster will stay iconized until all 1000 sessions of the simulation are completed. The icon will indicate percent complete as StrategyMaster is running. As soon as the simulation is complete, you will see a small window pop-up window appear saying, "StrategyMaster is Finished!".

Click **OK**. You will see the **Overall Results window** appear with <u>similar</u> results to the one shown below.

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The results given under the "Fundamental Five", "Highs and Lows", and "Averages" are all reported with respect to a given session. The results repported under "Totals" at the botton of the window represent *cumulative* totals for all sessions simulated. Click on the "Sessions" button. A window will appear similar to the one shown below. This scrolling window shows the results for *each* of the 1000 sessions that were simulated by StrategyMaster.

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Click on the text "**Exit**" in upper left part of the window. This will take you back to the "Overall Results" window.

Understanding the Results

Let's see how to interpret the results for the Fundamental Five.

- a. The **WinRating** is 49.4% +/-5pts. This means that you can expect to win about 49% of your sessions at the table, or in other words, you can expect to win about 5 out of every 10 sessions you play.
- b. The **WinGoal** Rating is 40.5%. This means that you can expect to reached your Win Goal (\$215) about 40% of of the time, or in other words, you can expect to reach your Win Goal about 4 out every 10 sessions you play.
- c. The **Avg. Playtime** and **Avg. Net-per-Session** should always be looked at together. With this strategy, you can expect your session to last an average of 1 hr. and 42 min. and during this time you can expect your session to cost you an average of \$7.81.
- d. The **VigRating** is 0.56%. Since the Pass Line w/double odds was the only bet, we know the *ideal* value is 0.61%. StrategyMaster was close enough considering *only* 1000 sessions were simulated.

OBSERVATION: For short simulations with a total Playtime of less than 1000 hours, the VigRating can sometimes show up as a negative number (indicating the odds are in your favor). This is not a flaw in the software but rather is a real possibly for short runs. However, over much longer simulations the VigRating will eventually represent a consistent number which represents the House Advantage for your entire Strategy.

Let's see how to interpret the results for the Highs and Lows.

- a. The "**Most ever AHEAD**" for a given session was \$262. Looking back up in the Fundamental Five area of the window you can see the Win Goal for this strategy was \$215. Since the win goal was \$215, how can the most ever ahead be \$262? The answer is simple. The winnings after one of the simulated sessions was \$212, not yet at your win goal so the session didn't end. Then, the very next game won (\$50) and brought the total winnings to \$262 which ended that session.
- b The "**Most ever DOWN**" for a given session was \$268. Looking back up in the Fundamental Five area of the window you can see the Loss Limit for this strategy was \$240. Since the Loss Limit was \$240, how can the most ever ahead be \$268? The answer again is simple. The losses after one of the simulated sessions was \$238, not yet at your Loss Limit so the session didn't end. Then, the very next game lost (\$30) and brought the total losses to \$268 which ended that session.
- c. **Playtime for Winning Session**. This is the range of time that was played when a session ended in a win. In this case, the range of time was 0:12 to 3:06. What is important to note here is that there is a very large "window" of time in which you can hit your Win Goal. Some sessions hit their Win Goal in only 12 minutes. This can be good or bad. If you just want to win, then 12 minutes might be OK. But if you want more Playtime then 8 minutes is not good. On the other hand, there was at least one session (i.e. 3:06) that you could play all the way to your Time Limit and still not reach your Win Goal.
- d. Playtime for Losing Session. This is the range of time that was played when a session ended in a loss. In this case, the range of time was 0:10 to 3:08. What is important to note here is that there is a very large "window" of time in which you can hit your Loss Limit. Some sessions hit the Loss Limit in only 10 minutes. This is not good to have some of your sessions lose all your money so fast. On the other hand, there was at least one session (i.e. 3:08) that you could play all the way to your Time Limit and still not reach your Loss Limit. You will see in just a moment how to fine-

tune your Money Management numbers to get a much longer minimum playtime, even if you lose.

Let's see how to interpret the results for the Averages.

- a. Averages Winning Sessions. When a session ended and you didn't lose, this is the amount of money you can expect to win and how long you can expect it will take. In this case when a session won, you walked away from the table with an average of \$202 and each winning session played for an average of 1 hr. and 36 min.
- b. Averages Losing Sessions. When a session ended and you didn't win, this is the amount of money you can expect to lose and how long you can expect it will take. In this case when a session lost, you walked away from the tables down an average of \$213 and each losing session played an average of 1 hr. and 48 min.
- c. **Average Net-per-Hour**. This is your average "cost per hour" to play your strategy. This is a significant number since it is one of the primary indicators of what to expect your entertainment is going to cost and whether or not you can afford to play this strategy. In this case, your can expect an *average* cost per hour of \$4.60 to play this strategy.

OBSERVATION: On short simulations with a total Playtime of less than 1000 hours, the Net-per-Hour can sometimes show up as a positive number (indicating cash flow in your favor). This is not a flaw in the software but rather is a real possibly for short runs. However, over much longer simulations the Net-per-Hour will eventually represent a consistent number which represents the *expected* Cost-per-Hour for your entire Strategy.

Conclusions

Let's look and see how the Strategy performed.

Advantages:

- The WinRating for this strategy is about 49%. Not too bad considering *most* people lose at the casino.
- The WinGoal Rating for this strategy is about 40%. Still not too bad.
- The *average* "cost per hour" to play this strategy is only \$4.60. Very good entertainment value.
- The Fundamental Five indicates that you can play this strategy for an average of 1 hr. 42 min. and with a cost on only \$7.81. Very reasonable.
- The VigRating is 0.56%. An excellent VigRating since it keeps the casinos cut down to a bare minimum.

Disadvantages:

• You can lose \$240 (Loss Limit) in as little as 10 min. Not good at all. This can be fixed by "finetuning" the Money Management numbers.
Step 3 - Fine-tuning Your Strategy If You Are a Conservative Player

Let's continue where we left off. You saw how to use the Money Management Assistant help you find a "good starting point" for your Money Management numbers. Now you will see how to use these numbers to "fine-tune" your strategies performance to satisfy the Conservative Player. Fine-tuning a strategy simple means modifying the Money Management numbers to get results to match the type of player that you are. Let's say you are a conservative player and therefore want to have a very good chance of winning (i.e. WinRating of greater than 50%) but not necessarily winning a lot of money. In order to do this, we will begin with the "good starting point" that the Money Management Assistant gave us.

Remember that the Money Management Assistant numbers will give you about a 50% WinRating. In order to get a higher WinRating, all you have to do is lower your Win Goal and/or increase your Loss Limit. Let's start to "fine-tune" this Betting Strategy by adjusting the Money Management numbers.

From the **StrategyMaster** menu, choose **Setup Bets**, then choose **Money Management**. The "Money Management" dialog box will appear.

- 1. Lower the Win Goal from \$215 to \$80. Click OK. This will take you back to the IGS crap table.
- 2. Click on the **Reset** button located below the IGS crap table, then click on the **Run** button. CASINO PLANNER will shrink down to an icon for maximum speed.
- 3. StrategyMaster will stay iconized until all 1000 sessions of the simulation are completed. As soon as the simulation is complete, you will see a small pop-up window which says, "StrategyMaster is Finished!".
- 4. Click **OK**. You will see the **Overall Results window** appear with <u>similar</u> results to the one shown below:

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Notice that by lowering \$215 to a more *realistic* Win Goal of \$80, you have increased your chances of winning to around 70%. This means that before you even start to play at the crap table, you know that *you* have the advantage over the casino to win for that session at the table. The odds are actually in your favor to win for a given session at the crap table. This is possible because you are risking more money (\$240) than you are willing to win (\$80). This means if one session lost \$240, then you would have to win three sessions to break even. Since this strategy has a very high WinRating it is considered to be a good one for the conservative player.

It can be clearly seen that just by adjusting the Money Management numbers, the results can be *dramaticlly* different. A good example of is can be seen in the improvement of the WinRating and WinGoal Rating. The tradeoff of a higher WinRating is a decrease in *expected* Playtime. Another point to make here is that Money Manage Assistant numbers ran for twice the total simulation Playtime (1697 hrs.) as Conservative (816 hrs.) This is because it takes less time to reach a Win Goal of \$80 than it does to reach a Win Goal of \$215.

It is left up to you to continue "fine-tuning" this Betting Strategy by adjusting the Money Management numbers to see how they will produce different results. Keep in mind that an improvement in one area of the results will mean another area will get worse. Everthing is a tradeoff and everybody is looking for different things in the results, so it is up to you to determine what Money Management numbers you like.

RECOMMENDATION: When objectively comparing strategies, you should compare results in which both Strategies have at least a "*** Good" (i.e. three star) rating for the accuracy of the results. This means the Total Playtime must be at least 750 hours.

If You Are an Aggressive Player

Recall, the Money Management Assistant helped find a "good starting point" for your Money Management numbers. Let's see how to use these numbers to "fine-tune" your strategy's performance to satisfy the Aggressive Player. Fine-tuning a strategy simple means modifying the Money Management numbers to get results to match the type of player that you are. Remember, an aggressive player wants to risk little to win much (i.e. WinRating of much lower than 50%). In order to do this, we will begin with the "good starting point" that the Money Management Assistant gave us:

From the **StrategyMaster** menu, choose **Setup Bets**, then choose **Money Management**. The "Money Management" dialog box will appear.

- 1. Leave the WinGoal at \$215, but type in "50" in the Loss Limit box (i.e. amount you want to risk). This means the Aggressive Player is risking \$50 to try and quadruple his money to \$215. Click **OK**. This will take you back to the IGS crap table.
- 2. Click on the **Reset** button located below the IGS crap table, then click on the **Run** button. CASINO PLANNER will shrink down to an icon for maximum speed.

OBSERVATION: Your results from the *previous* run are not saved with your strategy and are cleared when you hit the Reset button, run StrategyMaster again or you select the **File** menu and choose **New** or **Open**. If you want to save the results first, you must print then on your printer.

- 3. StrategyMaster will stay iconized until all 1000 sessions of the simulation are completed. As soon as the simulation is complete, you will see a small pop-up window appear saying, "StrategyMaster is Finished!".
- 4. Click **OK**. You will see the **Overall Results window** appear with <u>similar</u> results to the one shown below:

{ewc D2HTools, D2H 256Color, help0046.bmp}

Notice the Accuracy of the Results is "** Fair". This is because the total Playtime for the simulation was only 449 hours. IGS recommends comparing results only when they have an accuracy rating of *at least* three stars (i.e. *** Good). To add more Playtime to the simulation is very simple. From the **Options** menu, choose **StrategyMaster**. Change the "Number of Sessions per Run" from 1000 to 2000. Click **OK**. This will take you back to the IGS crap table.

- 5. Click on the **Reset** button located in the Control Panel below the IGS Crap table, then click on the **Run** button. CASINO PLANNER will shrink down to an icon again for maximum speed. As soon as the simulation is complete, you will see a small pop-up window appear saying, "StrategyMaster is Finished!".
- 4. Click **OK**. You will see the **Overall Results window** appear with <u>similar</u> results to the one shown below:

{ewc D2HTools, D2H 256Color, help0047.bmp}

Now the Accuracy of the results is "*** Good". Notice that by lowering the Loss Limit from \$240 to \$50, you are risking \$50 to win \$215. If you were going to play this strategy at a real crap table, now you know that if you want to quadruple your money, you will have a 20% chance or one out of every five sessions at the table. Another point to make about this strategy is that it has an expected Playtime of *only* 30 minutes. Since this strategy has a very high chance of losing (80%), yet has the possibility of high return for the money at risk, it is considered to be a good strategy for the Aggressive Player.

If You Want a Minimum Amount of Playtime

Unlike the previous three runs, you do not need the Money Management Assistant numbers to help you. You will see how to find the Money Management numbers that will allow you to play your Betting Strategy for a minimum amount of time. This method is also good if you are Junket Player. A Junket Player is basically someone who has agreed, in advance, to play for a minimum number of hours (i.e. 8, 10, 12 hrs. etc.) in return for comps such as reduced air fare, hotel accommodations, food, show tickets and so on. But if you are going to play for 8 hours over the course of your stay at the hotel, how do you know what your Money Management numbers should be? The answer is very simple.

Setting Up the Strategy

1. From the File menu, choose New. The "Money Management" dialog box will appear.

In the Strategy Description box, type "\$10 Pass w/double Odds". In the Win Goal and Loss Limit boxes type in "1000000" for each. This will prevent your strategy from ever reaching a Win Goal or Loss Limit and thus allow every session to hit the Time Limit during the StrategyMaster run. In the Time Limit box, type in 8 hours. Click **OK**. This will take you back to the IGS crap table.

Let's use a more direct way to bring up the "Make A Bet" dialog box. Hold down the CNTRL key and click with the left mouse button on the upper 50% area of the Pass Line (the lower 50% is for Free Odds). The "Make A Bet on the Pass Line" dialog box will appear.

Type in a Fixed Bet amount of \$10.

- 3. Click on the **Free Odds** button. The "Make A Bet on the Pass Line Odds" dialog box will appear. Select "double odds" for when the point is "4 or 10" and "5 or 9" and "6 or 8". Your Free Odds bet will be \$20 no matter what the point is. Click **OK**. This will take you back to the "Make A Bet on the Pass Line" dialog box. Click **OK**. This will take you back to the IGS crap table.
- 4. Next, you must setup the total number of sessions that you want StrategyMaster to simulate. It is from these simulations that StrategyMaster will tally the results for your Strategy.

From the **Options** menu, choose **StrategyMaster**. The "StrategyMaster Options" dialog box will appear. Type in 1000 for the Number of Sessions. Make sure that Heavy CPU usage, Minimize while running, Restore When Completed and Firm Win Goal/Loss Limit are selected as shown.

Click **OK**. This will take you back to the IGS crap table.

Running StrategyMaster to Get The Results

- Click on the Run button. CASINO PLANNER will shrink down to an icon for maximum speed. As soon as the simulation is complete, you will see a small pop-up window appear saying, "StrategyMaster is Finished!".
- 2. Click **OK**. You will see the **Overall Results window** appear with <u>similar</u> results to the one shown below

{ewc D2HTools, D2H_256Color, help0048.bmp}

Understanding the Results

Let's see how to interpret the results for the Fundamental Five.

- a. The **WinRating** is 47.6% +/-5pts. This means that you can expect to win (some amount geater than \$0) about 47% of your sessions at the table, or in other words, you can expect to win *about* 5 out of every 10 sessions you play.
- b. The WinGoal Rating is 0%. (This value has no meaning for this type of simulation.)
- c. The **Avg. Playtime** and **Avg. Net-per-Session** should always be looked at together. With this strategy, your session will last 8 hrs. and during this time you can expect your session to cost you an average of \$28.
- d. The **VigRating** is 0.43%. Since the Pass Line w/double odds was the only bet, we know the *ideal* value is 0.61%. StrategyMaster was close enough considering *only* 1000 sessions were simulated.

Let's see how to interpret the results for the Highs and Lows.

a. The "**Most ever AHEAD**" for a given session was \$1666. There are two points to make about this number. One, do not expect to win more than this amount over the 8 hours of play. Two, you can use this number to help determine what might be a realistic Win Goal for this Betting Strategy. In other words, you can pick a number *much less* than this amount for your Win Goal.

b The "**Most ever DOWN**" for a given session was \$1800. This number is important because it indicates what the "worst case" amount of money you will need to play your Betting Strategy. Can you afford to lose this amount of money?

Let's see how to interpret the results for the Averages.

- a. Averages Winning Sessions. When a session ended and you didn't lose, this is the amount of money you can expect to win and how long you can expect it will take. In this case when a session won, you walked away after an hour period with an average of \$353.
- b. **Averages Losing Sessions**. When a session ended and you didn't win, this is the amount of money you can expect to lose and how long you can expect it will take. In this case when a session lost, you walked away after an hour period down an average of \$379.
- c. Average Net-per-Hour. This is your average "cost per hour" to play your strategy. This is a significant number since it is one of the primary indicators of what to expect your entertainment is going to cost and whether or not you can afford to play this strategy. In this case, your can expect an *average* cost per hour of \$3.56 to play this strategy. Very good "entertainment" value.

Conclusions

Let's look and see how the Junket Player strategy performed.

Advantages:

- By not allowing the StrategyMaster to reach the Win Goal and Loss Limit, you are able to see the **limitations** of the Betting Strategy. (i.e. Since the "Most Ever Ahead" was \$1666, don't expect to win more than this amount for 8 hours of play. On the other hand, "Most Ever Down" was \$1800, so you know what is a worst case Bankroll needed to play your Betting Strategy over an 8 hour period.
- The WinRating for this strategy is almost 50%. (assuming a bankroll to cover a worst case loss of \$1800). This means that you can expect to win 1 out of every 2 sessions.
- The *average* "cost per hour" to play this strategy is only \$3.56.
- The VigRating is very low.

Disadvantages:

• A very high Bankroll is needed to ensure play over the entire 8 hour period. (worst-case is \$1800)

It is left up to you to continue "fine-tuning" this Betting Strategy by adjusting the Money Management numbers to see how they will produce different results. Keep in mind that an improvement in one area of the results will mean another area will got worse. Everything is a tradeoff and everybody is looking for different things in the results, so it is up to you to determine what Money Management numbers you like.

Wrapping Up

The above examples only scratched the surface of what StrategyMaster can do. Like a spreadsheet which starts as a blank sheet, it's up to <u>you</u> to get the most out of StartegyMaster. There are literally countless strategies in the game of craps. The first step in determining what strategy is best for you, is deciding exactly what results you are looking for. Remember that what will work for you won't necessarily work for someone else. This is because different strategies are designed to do different things. Some are meant to win more frequently, others to have bigger payoffs. Still others are designed to give you a minimum amount of time at the table. Therefore, there is no single crap strategy that is ideal for everyone.

All strategies work differently depending on which bets you are making, how much you are betting, and also your *Money Management* numbers. Do you want to play like a high roller? Or, do you want to play with the least amount of money possible? Do you want to win big? If you are a Junket player, you may want a strategy that will give you at least so many hours of playing time (like 8 or 10 hours). No matter what your needs are, CASINO PLANNER will help you find the strategy that's best for you.

File Menu

New... Open... Save... Save as... Print Setup... View/Print Strategy... Export... Ext...

New...

Choosing **New** from the **File** menu will display the Money Management dialog box, since the first step in setting up a new strategy is Money Management. For more information, see description for Money Management dialog box under the Strategy Master menu in this section.

Open...

Choosing **Open** from the **File** menu will display the File Open dialog box. This option lets you access a strategy you saved earlier or one provided with CASINO PLANNER. To recall a strategy, look under the Files list and notice strategy file names ending with the extension ".wc1". Choose one by clicking on it with the mouse, then click OK.

If you can't find the file you are looking for, look in a different directory by selecting a new directory from the list under the Directories list box. Strategies that were provided with the CASINO PLANNER will be located in the "c:\igscraps" directory, unless this path was changed during installation.

Save...

Choosing **Save** from the **File** menu will save the current strategy that is open. If this is the first time you have saved a new file, you will see the "File Save As" dialog box. Check that the name of your strategy file is correct and that you have selected the right directory (select a new directory by choosing from the list in the "Directories" box). Remember that strategy filenames must end with ".wc1". Click OK when done.

Save as...

Choosing **Save as** from the **File** menu will display the File Save As dialog box. Through this dialog box you can save the current strategy under a different name. The filename that you give must end with the extension ".wc1". Make sure that you have selected the proper directory, or select a new directory by choosing from the list in the Directories list box. Remember, CASINO PLANNER strategies are located under "c:\igscraps" directory, unless this path was changed during installation. Click OK when done.

Print Setup...

Choosing **Print Setup** from the **File** menu will display the Select Printer dialog box. Select the printer that you want to use listed under Printer and Port.

Once the printer is selected press the "Print Setup" button {ewc D2HTools, D2H_256Color, help0049.bmp}. This will bring up the printer dialog box that has the specific printer controls. Make sure the settings are correct and click OK to print.

View/Print Strategy...

Choosing **View/Print Strategy** from the **File** menu will display the View/Print dialog box. This option lets you see a summary of your Strategy. You can also print the summary by selecting Print command from the menu. When you are finished viewing the information, click Exit! from the menu.

Export...

Choosing **Export** from the **File** menu will display the Export Sessions Results dialog box. You can use the Export command to send all the information contained in the Sessions Results window to an ASCII text file so you can import it into other programs such as *Microsoft*® *Excel* and *Lotus 123*. *ASCII* (American Standard for Computer Information Interchange) is a standard file format that allows different programs to exchange information easily. *ASCII* filenames end with *.txt*

Export button - Selecting this button will display the Save As dialog box. Give the file you want to save a name that ends with the extension ".**txt**". Check that the directory path is correct. Click OK and then click the Done button.

Done button - select this button to exit the Export command.

Once you input this information in *Microsoft*® *Excel* or *Lotus 123*, you can then create graphs and charts to more easily evaluate your strategy's performance. Refer to your *Microsoft*® *Excel* or *Lotus 123* manuals for the steps necessary to import and create graphs and/or charts.

Exit...

Choosing Exit from the File menu will close the CASINO PLANNER application.

Options Menu

Mode... General... StrategyMaster... Casino... Select Player... Sound Options

Mode...

Choosing **Mode** from the **Options** menu will display the Mode dialog box. When using CASINO PLANNER, you can be in one of two modes.-- Game Mode or StrategyMaster Mode. You can change from one mode to the other at any time, but this will cause a reset. The current mode of CASINO PLANNER is always displayed in the Control Panel located below the IGS crap table.

Game Mode - This mode is simply meant to allow you to practice playing a strategy after you have found one you like from the StrategyMaster mode. Therefore, you can play on your own as if you were at a real crap table for the benefit of preparing for a trip to a *real* casino.

DEFINITION: *Game Mode*. All bets must be made <u>manually</u>, one roll at a time, just like you would in a real casino

StrategyMaster Mode CASINO PLANNER will *automatically* make ALL your bets as defined by a Betting Strategy that is saved in memory. StrategyMaster can simulate up to 20,000 consecutive sessions in a short period of time. After a simulation is completed, StrategyMaster will tally the results and provide you a wide range of important information about your Strategy. With this information you will be able to "fine tune" your Strategy for optimum performance (i.e. WinRating, Playtime, cost, etc.), or objectively compare it to other strategies.

DEFINITION: *StrategyMaster Mode*. All bets are made <u>automatically</u> according to a predefined Betting Strategy that has been entered through the convenient "Make-A-Bet" window.

General...

Choosing **General** from the **Options** menu will display the General dialog box. This dialog box allows you to customize many different aspects of CASINO PLANNER.

When My Session Ends - This control tells CASINO PLANNER what to do with bets that are still on the table at the end of a simulated session. Remember that your session will end if you reach your WinGoal, your Loss Limit, or your Time Limit. When this happens, no new bets will be made, but some bets may still be on the table:

- Take down removable bets As soon as a session ends, this selection will remove bets on the table that do not have to wait for a "decision" (i.e. win or lose). There are only two bets that <u>can not</u> be removed before a decision is made -- Pass and Come during a point roll. Only after a decision is made on these type bets, will the session end.
- 2) Play out all bets on the table -- This selection will wait for a decision (i.e. win or lose) for bets on the table before the session will end.

Animation Settings - These controls allow you can adjust the speed of the action at the table.

- Single step though results If this check box is active then your losing bets will be removed from the table first, one bet at a time, and then your winning bets will be paid off, one bet at a time - just like a real casino. If this check box is not active then all losing bets will be removed and all winning bets will be paid off at the same exact time. By not having this check box active will significantly speed up the pace of the game, however, this is not the way it happens at a real casino.
- 2) **Roll results** This slide bar controls how fast CASINO PLANNER will cycle through the five roll results located just below Bankroll rail in the control panel. If you are interested in reading these five results after each dice roll then you will want to select a long delay (i.e move to left). Otherwise, you will want this slide bar to be set at the shortest delay of 0.1.
- 3) **Between rolls** This slide bar controls how fast CASINO PLANNER will roll the dice when Auto Roll button has been selected. Normally you will want this slide bar to be set at the shortest delay of 1 (far right). However, if you want to simulate a real casino which rolls the dice approximately every 30 seconds, you can adjust the speed accordingly.

Alarm - This control is only available in the StrategyMaster mode. The alarm can be used to notify you that a StrategyMaster run is complete. Since some runs can be long, you might not necessarily be using the computer. Instead, you might be in the next room in which case you can use the alarm to notify you that the simulation is complete.

- 1) Off This selection will not sound the alarm when StrategyMaster is done.
- 2) Once This selection will make one beep sound when StrategyMaster is done.
- 3) Continuos This selection will make a continuous beeping sound when StrategyMaster is done. When this occurs a small window will be displayed saying, "StrategyMaster is Finished!". Simply click the OK button to stop the alarm and the Overall Results window will automatically be displayed.

General Preferences - This control lets you choose some additional options for CASINO PLANNER.

- 1) **Display IGS logo at startup** If this check box is active then the IGS logo will pop up each time you start CASINO PLANNER, otherwise, the IGS logo will not be displayed.
- 2) **Player Animation** If this check box is active then animated players will be seen at the table in the lower left portion of the main screen, otherwise, no players will be shown. It should be noted that if "Player Animation" is selected, the pace of the game will slow down due to the activity associated with the animation.

Number of players - This option is only available when "Player Animation" is selected. It allows you to select the number of players at the table. When "Player Animation" is not selected, this option will be grayed out.

- 1) I am the only player You will be the only animated player at the table.
- 2) **Three players at the table** This selection will display three animated players at the crap table, including yourself. The dice will pass from player to player each time there is a new shooter just like in a real casino.

Auto-Correct Bet Amounts - This option controls whether or not you will be warned with a pop up window if you try to make a bet that doesn't match the correct odds. For example, if you had made a \$5 free odds bet and the point was 5 or 9 (a payoff of 3 to 2), a winner would result in a payoff of \$7.50. However, the casino will only pay in whole dollar amounts, so you would lose fifty cents. In this case an even bet amount, such as \$6, is necessary to avoid losing money.

- Correct without prompts This selection is for advanced players that know the correct bet amounts but don't want to bother with "assembling" the *exact* bet amount. For example, lets say you wanted to Place the 6 and 8 for \$6. All you would have to do is place these bets for \$5 each (i.e don't worry about wasting time with the extra \$1) and CASINO PLANNER will automatically adjust the bet to \$6 for you. This option will speed up the pace of the game.
- 2) **Correct with prompts** This selection is for beginners who may not be completely familiar with all the correct bet amounts on the table. Each time an incorrect bet amount is made, a pop up window will appear describing what you did wrong and a suggestion how to correct it.

StrategyMaster...

Choosing **StrategyMaster** from the **Options** menu will display the StrategyMaster Options dialog box. This dialog box has controls that are used in the StartegyMaster mode.

Number of Sessions Per Run - This number instructs StrategyMaster on how many sessions will be simulated each time StrategyMaster is run. The maximum Number of Sessions per Run is 20,000.

Minimize while running - If this check box is active then CASINO PLANNER will shrink down to an icon each time StrategyMaster is run to obtain maximum speed. This allows StrategyMaster to run a fast as your computer will allow. If this check box is not active then StrategyMaster will not shrink to an icon each run, but instead will display the IGS crap table as it updates in real time thus allowing you to look at the results under the StrategyMaster menu.

Restore when completed - If this check box is active then StrategyMaster will restore the IGS crap table when the run is completed. If you are busy doing other activities on you computer (i.e. other games or applications) and don't want to immediately look at the results when a run is completed, then leave this check box inactive.

Casino...

Choosing **Casino** from the **Options** menu will display the Setup Casino dialog box. Use this dialog box setup a casino that matches the casino you plan to visit. You can adjust the payoff odds of various bets, change the color of the table, and even control the color of individual playing chips. It is important to CASINO PLANNER has the same payoff odds as the casino you plan to visit, if not, the results could be dramatically different. For example, your favorite casino may offer you improved odds on Proposition bets in which case you should adjust the payoff odds to match using this dialog.

Other important factors may vary from one casino to another. These include the table color of the layout, minimum bet, and the table bet limit. CASINO PLANNER keeps track of all this for you, and enforces the rules of the table just as the dealer would at that casino.

"New" Casino - Some of the most popular casinos have already been set up for you. If the casino you plan to visit is not in the list, you can easily add casinos to the list as described below:

- 1) Click on the button called "New". A dialog box will appear titled "Your New Casino's Filename".
- Type in the name for your new casino just to the right of the word "Filename". Since this is a DOS file, you can only have up to eight characters for the name and the filename must end with ".csr" (i.e. Ballys.csr). Click OK. This will take you back to the "Setup Casino" Dialog.
- 3) Notice your casino name now appears below the word "Filename. Just to the right, type in a brief description of the casino (i.e. location and full name, etc.)

Now any changes that are made elsewhere in the "Setup Casino" dialog box will be saved under the new casino name.

Table Stakes - Type in the minimum bet and maximum bet for the crap table.

Free Odds - Select the free odds limit for the crap table. (Double odds is most common)

Proposition bets -

Type - There are two different ways to express the payoff odds for proposition bets, "to" and "for". Let's start out with an example in which you are betting \$1 on the "Any 12". If the layout at one casino for the "Any 12" bet says "29 to 1", this is the same as another casino that has a layout that says "30 for 1". In other words the vig is the same. When the layout says "29 to 1", this means that if you win the casino will pay you \$29 for your \$1 bet and the casino will not collect your bet. However, when the layout says "30 for 1", this means that if you win the casino will says "30 for 1", this means that if you win the same as an other casino will pay you \$29 for your \$1 bet and the casino will pay you \$30 and collect the \$1 bet, for a net win of \$29.

The person who is new to the game of craps might think "30 for 1" is better than "29 to 1", but in reality there is no difference at all. Some casinos like to use "for" instead of "to" since the "for" payoff *seems* like a better payoff and thus might attract more crap players to their tables.

2) **Payoff Odds** - Of all the Proposition Bets, there are four bets which have payoff odds that can vary from casino to casino. These include the Any 2, Any 3, Any 11(Yo) and Any 12 bets which are shown just to the right of the "Payoff Odds" area of this dialog.

"Basic Odds" refers to what most casinos would have for there payoff odds on these four bets (i.e. Any 12 payoff is 29 to 1).

"Improved odds" refers to casinos that give slightly better payoff odds on these four bets in order to attract more players to their casino (i.e. Any 12 payoff is 30 to 1).

"Custom Odds" can be used in cases where the casino you plan to visit has neither basic nor improved odds. There are a few casinos that offer even better payoff odds than "Improved odds" (i.e. Any 12 payoff is 31 to 1). In this case you can select "Custom" and type in the free odds without any restrictions.

- 3) **Field** The Field bet payoff for the 2 and 12 can vary from casino to casino. Therefore, select single, double or triple odds to match the casino you plan to visit.
- 4) Rolls per hour There are approximately 120 rolls of the dice each hour. A busy table might have

slightly less, a non-busy table might have slightly more. In a real casino, several moments (even minutes) may pass between dice rolls. However, the average time is about thirty seconds. This equates to about two rolls per minute or 120 rolls per hour (2 rolls/min multiplied by 60 min/hr). The number of rolls per hour can not be perfect. What does matter is that when comparing strategies, you keep the "Rolls per hour" the same. You probably will never need to adjust this parameter, but if you want the capability to adjust this number, you can.

RECOMMENDATION: It is strongly advised that you leave the rolls per hour at 120.

- 5) Layout Color Table color for the layout can vary. The most popular layout color is green, with some casinos using blue. The gray table is not used by casinos but it is very practical for CASINO PLANNER since the chip colors are easier to see, and there are different shades of gray to help you identify unlabeled bets.
- 6) Chip colors Chip colors can vary from casino to casino. However, the most popular chip colors are defined as follows: White = 1, Red = 5, Green = 25 and Black = 100. You can change the chip colors as follows:

Under "Chip Colors," select the chip whose color you wish to change by clicking the dollar amount button.

To learn more about the different options that are available, refer to the picture below. Move the cursor over the picture. When the cursor becomes a hand, click to get information on that part of the picture.

Choose from a list of "Basic Colors":

Choose any color on the list. These colors cannot be changed. To select a custom color, see Choose from a list of "Custom Colors.





Choose from a list of "Custom Colors":



How to Create a New Custom Color

Only 16 colors can be on the list at any one time. To create a new color, you must replace an existing color. To create a NEW Custom Color:





Color Refiner Box

The Color Refiner Box is used to select a new Custom Color.



U ursor (U rossnair).
D rag to select a new color.

Color|Solid Box

When you pick a color by dragging the cursor inside the Color Refiner Box, the color selected appears inside the left half of the Color|Solid Box.



Hue,Sat,Lum Boxes

You can specify a color by typing numbers in the "Hue," "Sat," and "Lum" (Luminosity) boxes. This also allows you to exactly match a specific color. For example, if you like a particular color in a certain graphic file, you can use your paint program to identify the HSL components of that color. By typing these same numbers here, you will create an exact match of the color in the graphic file.

Red,Green,Blue Boxes

You can specify a color by typing numbers in the "Red," "Green," and "Blue" boxes. This also allows you to exactly match a specific color. For example, if you like a particular color in a certain graphic file, you can use your paint program to identify the RGB components of that color. By typing these same numbers here, you will create an exact match of the color in the graphic file.

Add to Custom Colors

This button is used to add a NEW color to the list of Custom Colors.

Select Player...

Choosing **Select Player** from the **Options** menu will display the "Select a Player to represent yourself" dialog box. There are 12 animated players included with CASINO PLANNER, each with their own personality and mannerisms. Choose the one you want to represent yourself by clicking in the box next a character's name. CASINO PLANNER will pick the other players at random and display them at the table.

Sound Options

Choosing **Sound Options** from the **Options** menu will display the Sound Options dialog box. CASINO PLANNER allows you to "turn on" the type of sounds you want to hear and "turn off" the ones you don't. You can have real casino sounds as well as music playing in the background. Many MIDI (music) files come with the software, or you can use your own.

Speech - If this check box is active, you will hear the stickman call the outcome of each roll, and you will also hear a voice when a warning dialog box pops up. If this check box is not active, these sounds will not be heard.

Sound Effects - If this check box is active, you will hear the dice as they are rolled and the sound of bets as they are placed and taken away. If this check box is not active, these sounds will not be heard. The computer can payoff and remove bets faster than your eye can see. Therefore, CASINO PLANNER has two convenient sounds that will indicate whether you won or lost money for your for a given roll of the dice. If you net for a dice roll wins money, you will hear a bell sound. If your net for a dice roll loses money, you will hear a "cash register" sound.

Crowd Sounds - If this check box is active, you will hear casino background sounds. You will even hear crowd sounds and slot machines in the background to experience the feel of a real casino. If this check box is not active, these sounds will not be heard.

Music - Most casinos play music that can be heard from speakers located in the ceiling. If this check box is active, ten music selections will play in sequence in the background just like a jukebox. These selections are MIDI files listed under the "Music Files" list box.

- Music Files This shows a list of ten MIDI files that will be cycled through, just like a jukebox. CASINO PLANNER includes two MIDI files which make up the list of ten files. You aren't limited to using only those MIDI files provided with the software. If you have your own MIDI files, you can play these too. Just remember, ten files must be on the play list at all times. You can replace an item on the list, but you <u>cannot add or delete any items</u>. To replace a music file on the list:
 - a. Click once on the filename with the mouse. A "Select a MIDI file" window will appear.
 - b. Use the "Directories" list box to locate the MIDI file you are interested in. As you change a directory, you will see any ".mid" files listed under the "Files" list box. You may only select filenames that end with ".mid."
 - c. Once the MIDI file you want appears under the "Files" list box, click *once* on the file to select it and then click OK to return back to the Sound Options dialog. You will now see the new MIDI file in place of the previous one that you selected. Click OK to return back to the IGS crap table.

StrategyMaster Menu

Setup Strategy...Money Management Setup Strategy...Bets Run...Go Run...Reset Results...Overall Results...Each Session Results...Bankroll Graph Results...Shooter

Setup Strategy...Money Management

Choosing **Setup Strategy**...**Money Management** from the **StrategyMaster** menu will display the Money Management dialog box. Money Management plays a vital role in planning a winning trip to the casino. It is only by the proper use of Money Management that you can actually have a better than 50% chance in beating the casino on your next trip. In other words, if you are willing to risk more money than you are willing to win (i.e. Loss Limit is greater than Win Goal), you can <u>easily</u> have WinRatings of greater than 50%.

Strategy Description - Type in meaningful name to keep track of your strategy since filenames are limited to the DOS standard of 8 characters in length. This description appears in the in the title bar of IGS crap table window. To enter a description.

Win Goal - Type in the amount of money you would like to win while playing your Betting Strategy.

Loss Limit - Type in the amount of money you are willing to *risk* in order to obtain your Win Goal.

Bankroll - CASINO PLANNER automatically controls this amount and is always twice your Loss Limit or \$500, which ever is greater.

Time Limit - If you don't reach your Win Goal or Loss Limit, you need to limit the amount of time you spend at the table. Your Time Limit is the maximum period of time that that you are willing to play your Betting Strategy in order to obtain your Win Goal.

Filename - The first time you save your Strategy, you will be prompted to give your Strategy a filename. This filename will be shown in this dialog.

Money Management Assistant - For a given Betting Strategy, the Money Management Assistant will automatically give you a "good starting point" for a realistic Win Goal, Loss Limit and Bankroll needed to play your strategy.

For more information, see <u>How to Use the "Money Management Assistant How to Use the "Money</u> <u>Management Assistant</u>.

Setup Strategy...Bets

Choosing **Setup Strategy**...**Bets** from the **StrategyMaster** menu will display the Betting Strategy dialog box. Through this dialog box you can enter your Betting Strategy. You can also open this dialog box by clicking once on the "Betting Strategy" button located in the Control Panel below the IGS crap table.

Forty-five possible crap bets are listed, each having a corresponding check box. You can scan this dialog box quickly for *active* check boxes to see which bets are used by your Betting Strategy. Click on any check box to open the Make A Bet dialog box. This is where you define the specific details of a bet, such as when to make the bet and for how much. The Make A Bet dialog box is virtually the same for every crap bet on the table. Therefore, once you have learned how to use it, you can enter other bets the same way.

SHORTCUT: To directly open the Make A Bet dialog box for a particular bet, move the cursor over the IGS crap table, hold down the CNTRL key and click on the layout with the *left* mouse button.

RULE: Anytime the OK button is selected, StrategyMaster will assume that a change has been made to your Betting Strategy and therefore perform a reset. Any results that may have been stored will be lost. If you have not made changes (i.e. you were just checking your bet amount, etc.) and do not wish StrategyMaster to reset, use Cancel instead of OK to close the window.

Current Odds - This defines the True odds, Payoff odds, and Vigorish for this particular bet. Some True odds are expressed as * to * and means the true odds for this bet can not be expressed easily with two numbers.)

Current Bet - This box shows the amount of this bet (if any) that was on the table at the time the Make A Bet dialog box was opened.

Fixed Bet - Enter a bet amount in this box if you want a fixed bet amount to be made for each new crap game. You can type a dollar amount in this box or use one of the shortcut buttons. The text "Fixed Bet" changes to "Initial Bet" when the Bet Sequencer is being used. The Bet Sequencer is described in detail in Appendix A.

Computer-Controlled Bet - If this check box is selected then any bets and controls associated with this particular Make A Bet dialog box will be executed by StrategyMaster. If this check box is not selected then any bets and controls associated with this particular Make A Bet dialog box will stay setup the way they are, except that all information in this dialog box will be *ignored* by StrategyMaster. This avoids the hassle of going into the dialog box and typing in zero dollar amounts everywhere to disable the bet. Use this control as a *quick way* to disable a bet when using StrategyMaster.

Conditional Betting - This control defines when StrategyMaster will make a particular bet.

- 1) All Rolls This selection will make the bet every roll of the dice (i.e. both Comeout and Points rolls).
- 2) **Comeout Rolls Only** This selection will make the bet only on Comeout rolls, not Point rolls.
- 3) **Point Rolls Only** This selection will make the bet only on Point rolls. You must also indicate which Point numbers this bet will be *active* by selecting the check box above the desired Point number.

Free Odds button - You can use the Free Odds button to open the Free Odds dialog box. You have great flexibility in setting up your *free odds* bets when making a Pass, Don't Pass, Come or Don't Come bets. For *each* established Point. there are five selections to choose from:

- 1) No odds No *free odds* bets will be made
- 2) Single odds StrategyMaster automatically calculates your single odds bet.
- 3) Double odds StrategyMaster automatically calculates your double odds bet.
- 4) Triple odds StrategyMaster automatically calculates your triple odds bet.

5) Custom odds - You manually type in any free odds amount you want.

Bet Sequencer button - You can use the Bet Sequencer button to open the Bet Sequencer dialog box. Through this dialog box you can define a winning and/or losing sequence for your bet. For more information, see Appendix.

NOTE: The Bet Sequencer is an advanced feature of CASINO PLANNER. It is not recommended to use this feature until you are comfortable using "Fixed bets" with StrategyMaster.

Run...Go

Choosing **Run...Go** from the **StrategyMaster** menu will cause StrategyMaster to simulate a predefined number of sessions based a Strategy that has been entered.

Run...Reset

Choosing **Run...Reset** from the **StrategyMaster** menu will cause StrategyMaster to prematurely abort the current simulation.

Results...Overall

Choosing **Results...Overall** from the **StrategyMaster** menu will display the Overall Results window. This window provides a wide range of important information about your Strategy. This window will appear after every StrategyMaster run or if you don't want to wait to see the results, you can look at this window during the *middle* of a simulation run. The window is partitioned into four main groups to make it easy to understand your Strategy's performance:

- 1) The Fundamental Five
- 2) Highs and Lows
- 3) Averages
- 4) Totals

The Fundamental Five

Definition: *Fundamental Five*. A summary of vital information about a Strategy that characterizes its performance, and thus, allows for quick and easy comparison between strategies. Also, the Fundamental Five provides practical information that you need to know when going to a *real* casino.

The Fundamental Five includes the following:

- 1) Your actual chances of winning (your WinRating[™].)
- 2) Your chances of achieving your Win Goal (your WinGoal RatingTM).
- 3) Your Average **Playtime** at the table.
- 4) Your Average NET-per-Session at the table.
- 5) The VigRating or House Percentage for your entire Strategy.

Fundamental Five Item #1: The WinRating - While using a particular Strategy, the WinRating indicates what your chances of winning are at the time your session ends. The WinRating is expressed in terms of percent. If a Strategy has a WinRating of 70%, then you would have a 70% chance of walking away from the table with *more money* than you started with.

Fundamental Five Item #2: WinGoal Rating - For a given session at the table, the WinGoal Rating indicates what your chances are of reaching a predetermined Win Goal amount while using a particular Strategy. The WinGoal Rating is expressed in terms of percent. If a Strategy has a WinGoal Rating of 75%, then you would have a 75% chance of walking away from the table with your Win Goal amount.

The difference between the WinRating and WinGoal Rating:

- 1) WinRating refers to winning any amount of money at the time a session ends.
- 2) WinGoal Rating refers to winning a predetermined <u>Win Goal amount</u> at the time a session ends.

OBSERVATION: The WinRating will be *greater than* the WinGoal Rating if at least one winning session ends by reaching its Time Limit.

OBSERVATION: The WinRating will be *equal* to the WinGoal Rating if every winning session ends before reaching its Time Limit.

Fundamental Five Item #3: Average Playtime - The "Average Playtime" indicates how long you can *expect* a session to last while using a particular Strategy. The <u>actual</u> Playtime for any <u>one</u> session can vary greatly from session-to-session. Therefore, the <u>Average</u> Playtime_is useful for objectively comparing one strategy to another.

Fundamental Five Item #4: Average NET-Per-Session - The "Average Net-per-Session " indicates how much money you can *expect* a session to cost while using a particular Strategy. The <u>actual</u> cost for any <u>one</u> session can vary greatly from session-to-session. Therefore, the <u>Average</u> Net-per-Session is useful for objectively comparing one strategy to another.

Fundamental Five Item #5: The VigRating - The VigRating is the advantage that the casino has over the player for an entire Betting Strategy. It is a measure of how fast you can *expect* to lose your money based on the total amount of money bet while playing a certain Betting Strategy. (See Appendix F)

Highs and Lows

Most Ever Ahead - The most you were ever ahead for a given session during the StrategyMaster run.

Most Ever Down - The most you ever down for a given session during the StrategyMaster run.

Playtime Winning Session (Min./Max.) - For all sessions that ended in a win, this is the range of Playtime.

Playtime Losing Session (Min./Max.) - For all sessions that ended in a loss, this is the range of Playtime.

Averages

Winning Sessions (\$) - Average amount of money won when a session ended in a win.

Winning Sessions (Hrs:Min) - Average Playtime when a session ended in a win.

Losing Sessions (\$) - Average amount of money lost when a session ended in a loss.

Losing Sessions (Hrs:Min) - Average Playtime when a session ended in a loss.

NET-per-Hour - The amount of money you can *expect* to lose, over time, for every hour that a particular Betting Strategy is played. (i.e. NET-per-Hour = "expected cost")

Totals

Winning Sessions - Number of sessions that won out of total number of sessions simulated.

Sessions Completed - Total sessions have been currently run.

% Sessions Completed - The percent of how many sessions have been completed.

Total Dice Rolls - Number of dice rolls that were made for all sessions simulated.

Dice Accuracy - The accuracy of the dice rolls from there ideal value.

Total Winnings - A cumulative total of all money won when a session ended in a win.

Total Money Bet - A cumulative amount of all money bet for all sessions simulated...

Total Markers Taken - The number of markers that were taken for all sessions simulated.

NET (Total Ahead/Down) - The cumulative amount of money won and lost for all sessions simulated.

Total PLAYTIME - Total playtime for all sessions simulated.

Results...Each Session

Choosing **Results...Each Session** from the **StrategyMaster** menu will display the Sessions Results window. This window shows you <u>more detail</u> as to what actually happened during the StrategyMaster run. This scrolling window contains session-by-session accounting of what occurred during the StrategyMaster simulation. Any *one* of these sessions could represent your next session at a *real* casino. You can view this information after the StrategyMaster run is completed, or see it update while the run is in progress. You can scroll and view up 20,000 sessions.

{ewc D2HTools, D2H_256Color, help0057.bmp}

The summary bar at the top of the window gives you running totals for the column below. Below the summary bar, are the results for each individual session that was simulated.

"Ses #" Column - This column shows, in ascending order, the session number for each of the individual sessions as it was simulated by StrategyMaster. If you view this window in the middle of a run then this number will increase until the run is finished.

"Result" Column - This column indicates how your session ended. The WinRating is shown at the top of the "Result" column and is based on the total number of winning sessions.

- 1) "T/L" = Time limit reached, Lost your session
- 2) "T/W" = Time limit reached, Won your session
- 3) "T/E" = Time limit reached, you broke Even
- 4) "W/W" = WinGoal reached, Won your session
- 5) "L/L" = Loss limit reached, Lost your session

"Rolls" Column - This column shows the number of dice rolls made during each session.

"Hr:Min" Column - This column shows the elapsed play time to complete each session.

"Low" Column - This column shows the "Most ever DOWN" during that session. This column is used to determine the "Most ever DOWN" number in the "Highs and Lows" part of the Overall Results window.

"High" Column - This column shows the "Most ever AHEAD" during that session. This column is used to determine the "Most ever AHEAD" number in the "Highs and Lows" part of the "StrategyMaster Results" window.

"Net" Column - This column shows the amount of money you won or lost at the end of each session.

"Sum Net" Column - This column shows the *cumulative* win/loss as each session was completed. In other words, this is a running total of how much you have won or lost so far during the course of the StrategyMaster run. "Overall Net" at the top of this column indicates the *cumulative* total amount you won/lost for the entire run.

"Dice Acu" Column - This column indicates how accurate the dice rolls were compared to their ideal value during a particular session. Since the number of rolls for any given session is not that high, do not expect the dice accuracy to be very good.

Results...Bankroll Graph

Choosing **Results...Bankroll Graph** from the **StrategyMaster** menu will display the Session Bankroll History graph. This is a graph of your money during the current session of the StrategyMaster run. Sometimes it is more helpful to see a picture rather than a bunch of numbers.



If the black line is above the blue dotted line, you are ahead. If the black line is below the blue dotted line, you are down. The closer the black line is to the green dotted line, the closer you are to reaching your Win Goal. The closer the black line is to the red dotted line, the closer you are to hitting your Loss Limit. You can re-size and move this window anywhere you find convenient.

Results...Shooter

Choosing **Results...Shooter** from the **StrategyMaster** menu will display the Shooter Statistics window. This feature lets you keep track of how all shooters are doing during the simulation. This helps you decide when to bet on other shooters while in the Game mode.

Use the arrow buttons to select a shooter. The shooter's name and picture are displayed (the picture is only displayed if the Player Animation view is currently turned ON). All information in this window is valid for the current session only. StrategyMaster does not track Shooter Statistics from one session to another. Also, turning the Player Animation ON or OFF will reset the shooter statistics but will not reset the StrategyMaster results.

Introduction

The following contains a description of three strategies that are included with the mini version of CASINO PLANNER for Craps. Remember, strategies provided with this program are just a SAMPLE of what the software can do for you. To unleash the full power of CASINO PLANNER you need to create your own.

(Note: Confusion can happen when literally 100's or even 1,000's of strategies are created and saved with CASINO PLANNER. In an effort to reduce the confusion, a naming convention was created. Strategies are categorized by the BASIC type of bet used by the strategy. The remaining characters are numbered sequentially as systems are created in a category. The WC1 extension stands for Windows Craps 1.)
Strategies

PASS0001.WC1

Money Management: Win Goal = \$20; Loss Limit = \$40; Time Limit = 3 Hrs. Betting Strategy: \$5 Pass

This strategy is good for the player who is new to the game. Master the Pass line first before trying other advanced strategies.

PASS0002.WC1

Money Management: Win Goal = \$75; Loss Limit = \$150; Time Limit = 3 Hrs.

Betting Strategy: \$5 Pass w/double odds

This is the simple Pass Line strategy with double odds.

PASS0003.WC1

Money Management: Win Goal = \$75; Loss Limit = \$150; Time Limit = 3 Hrs.

Betting Strategy: \$5 Pass, using IF I WIN Bet Sequencer

This strategy uses the Bet Sequencer. If the Pass Line bet wins, press bet one unit (in this case \$5). If Pass bet reaches \$45 then stay at \$45. Whenever the Pass Line bet loses, return back to initial bet of \$5.

Bets

CASINO PLANNER supports dozens of different craps bets and enforces the rules for each bet, just like the dealer would do at the casino. There are times when you are interested in the certain aspects of a particular bet (i.e. you forgot payoff odds). Help for all the bets on the IGS crap table is just a mouse click away.

RECOMMENDATION: Hold down the SHIFT key and click with the *left* mouse button on the IGS crap table for instant On-line Help for the bet you are interested in.

Help information on a specific crap bet includes definition, true odds, payoff odds, house advantage, decision, and vigorish. When you are done with the help, go to the **File** menu and choose **Exit**.



Typical "hot spots" for unlabled bets are shown.

Any Seven

Description:

The Any Seven bet is a one-roll bet that can be made at any time during the game.

Decision:

WINS if a 7 is rolled. LOSES if anything other number is rolled.

Payoff:

True odds = 5 to 1 Payoff = 4 to 1 Vigorish = 16.67%

Any Craps

Description:

The Any Craps bet is a one-roll bet that can be made at any time during the game.

Decision:

WINS if a either 2,3 or 12 is rolled. LOSES if anything else is rolled.

Payoff:

True odds = 8 to 1 Payoff = 7 to 1 Vigorish = 11.11%

Any 2

Description:

The Any 2 bet is a one-roll bet that can be made at any time during the game. The payoff depends on settings in the "Set Up Casino" window (to access this window, select "Options" and then "Casino").

Decision:

WINS if a 2 is rolled. LOSES if anything else is rolled.

```
Payoff: (<u>Odds</u> = "Basic"):

True odds = 35 to 1

Payoff = 29 to 1

Vigorish = 16.67%

Payoff: (<u>Odds</u> = "Improved"):

True odds = 35 to 1
```

Payoff = 30 to 1 Vigorish = 13.89%

Any 3

Description:

The Any 3 bet is a one-roll bets that can be made at any time during the game. The payoff depends on settings in the "Set Up Casino" window (to access this window, select "Options" and then "Casino").

Decision:

WINS if a 3 is rolled. LOSES if anything else is rolled.

```
Payoff: (<u>Odds</u> = "Basic"):
True odds = 17 to 1
Payoff = 14 to 1
Vigorish = 16.67%
Payoff: (<u>Odds</u> = "Improved"):
True odds = 17 to 1
Payoff = 15 to 1
```

Vigorish = 11.11%

Any 12

Description:

The Any 12 bet is a one-roll bet that can be made at any time during the game. The payoff depends on settings in the "Set Up Casino" window (to access this window, select "Options" and then "Casino").

Decision:

WINS if a 12 is rolled. LOSES if anything else is rolled.

```
Payoff: (<u>Odds</u> = "Basic"):

True odds = 35 to 1

Payoff = 29 to 1

Vigorish = 16.67%

Payoff: (<u>Odds</u> = "Improved"):

True odds = 35 to 1
```

Payoff = 30 to 1 Vigorish = 13.89%

Any 11 (Yo)

Description:

The Any 11 (YO) bet is a one-roll bet that can be made at any time during the game. The payoff depends on settings in the "Set Up Casino" window (to access this window, select "Options" and then "Casino").

Decision:

WINS if a 3 is rolled. LOSES if anything else is rolled.

```
Payoff: (<u>Odds</u> = "Basic"):
True odds = 17 to 1
Payoff = 14 to 1
Vigorish = 16.67%
Payoff: (<u>Odds</u> = "Improved"):
True odds = 17 to 1
Payoff = 15 to 1
```

Vigorish = 11.11%

Horn

Description:

The Horn Bet is a one roll bet that can be made at any time during the game. It consists of the Any 3, Any 2, Any 12, and Any 11 all at same time

Description:

The Hardway 4 bet is multiple-roll bet and can be made and removed at any time during the game.

Decision:

WINS if a 2 appears on BOTH DICE (2 + 2 = 4, the "hard way").

LOSES if a 7 is rolled and also if 4 is rolled the "easy way" (3 + 1).

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 8 to 1 Payoff = 7 to 1 Vigorish = 11.11%

Description:

The Hardway 6 bet is multiple-roll bet and can be made and removed at any time during the game.

Decision:

WINS if a 3 appears on BOTH DICE (3 + 3 = 6, the "hard way").

LOSES if a 7 is rolled and also if 6 is rolled the "easy way" (4 + 2 or 5 + 1).

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 10 to 1Payoff = 9 to 1Vigorish = 9.09%

Description:

The Hardway 8 bet is multiple-roll bet and can be made and removed at any time during the game.

Decision:

WINS if a 4 appears on BOTH DICE (4 + 4 = 8, the "hard way").

LOSES if a 7 is rolled and also if 8 is rolled the "easy way" (2 + 6 or 3 + 5).

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 10 to 1Payoff = 9 to 1Vigorish = 9.09%

Description:

The Hardway 10 bet is multiple-roll bet and can be made and removed at any time during the game.

Decision:

WINS if a 5 appears on BOTH DICE (5 + 5 = 10, the "hard way").

LOSES if a 7 is rolled and also if 10 is rolled the "easy way" (6 + 4).

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 8 to 1 Payoff = 7 to 1 Vigorish = 11.11%

Pass Line

Description:

The Pass Line bet is an easy multi-roll bet that can only be made on a Comeout roll (the first roll of a new game).

Decision:

On the Comeout roll (bet is removable):

WINS if a 7 or 11 is rolled.

LOSES if a 2, 3, or 12 is rolled.

If 4, 5, 6, 8, 9 or 10 is rolled, a <u>Point</u> is established and nothing happens to your money. The next roll will be a Point roll.

On the Point roll (bet is NOT removable):

WINS if the point number is repeated.

LOSES if a 7 is rolled.

Otherwise, no decision is made and the next roll will be a Point roll.

Payoff:

Payoff = 1 to 1 Vigorish = 1.41%

Pass Line Free Odds

Description:

This bet can only be made in conjunction with a Pass Line bet and only during a Point roll. Free odds bets may be reduced or removed at any time during any Point roll.

Decision:

WINS if the point is repeated

LOSES if a 7 is rolled.

Payoff:

POINT #	True Odds	<u>Payoff</u>	<u>Vigorish</u>
6 or 8	6 to 5	6 to 5	0.0%
5 or 9	3 to 2	3 to 2	0.0%
4 or 10	2 to 1	2 to 1	0.0%

Don't Pass

Description:

The Don't Pass bet is the opposite of the Pass Line bet and can only be made on a Comeout roll (the first roll of a new game).

Decision:

On the Comeout roll (bet is NOT removable):

WINS if a 2 or 3 is rolled.

LOSES if a 7 or 11 is rolled.

- If 4, 5, 6, 8, 9 or 10 is rolled, a Point is established and nothing happens to your money. The next roll will be a Point roll.
- If a 12 is rolled, it is a push and nothing happens to your money.

On the Point roll (bet is removable):

WINS if a 7 is rolled.

LOSES if the Point number is repeated.

Otherwise, no decision is made and the next roll will be a Point roll.

Payoff:

Payoff = 1 to 1 Vigorish = 1.40%

Don't Pass Free Odds

Description:

This bet can only be made in conjunction with a Pass Line bet and only during a Point roll. Free odds bets may be reduced or removed at any time during any Point roll. This bet can only be made in conjunction with a Don't Pass bet and only during a Point roll. Free odds bet may be reduced or removed at any time during any Point roll.

Decision:

WINS if if a 7 is rolled

LOSES if the Point number is repeated.

Payoff:

POINT #	True Odds	Payoff	Vigorish
6 or 8	5 to 6	5 to 6	0.0%
5 or 9	2 to 3	2 to 3	0.0%
4 or 10	1 to 2	1 to 2	0.0%

Come

Description:

The Come bet is identical to the Pass Line bet (same payoff and Vigorish) but is made on a Point roll rather than a Comeout roll.

Example:

Let's suppose that a Point has been established and the Point number is 4. Since it is a Point roll, you can make a Come bet by placing chips on the "Come" portion of the layout. Now, even though it is still a Point roll (the Point is 4), the next roll of the dice is considered the "Comeout" for your Come bet:

WIN if a 7 is rolled

LOSE if a 2, 3 or 12 is rolled.

If a 4, 5, 6, 8, 9 or 10 is rolled, it becomes the <u>Come Point</u> (a Point_for your Come bet only); your chips are moved to a place next to this Point number.

If a Point is established for your Come bet, in order to WIN you must now roll this Point number again BEFORE rolling a 7.

Come Free Odds

Description:

This bet can only be made in conjunction with a Come bet, and it can only be made after this Come bet has established its point. Free odds bets may be reduced or removed at any time.

Decision:

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This bet WINS if the Come bet's point is repeated and LOSES if a 7 is rolled.

Payoff:			
POINT #	<u>True Odds</u>	<u>Payoff</u>	<u>Vigorish</u>
6 or 8	6 to 5	6 to 5	0.0%
5 or 9	3 to 2	3 to 2	0.0%
4 or 10	2 to 1	2 to 1	0.0%

Don't Come

Description:

The Come bet is identical to the Don't Pass bet (same payoff and Vigorish) but is made on a Point roll rather than a Comeout roll.

Example:

Let's suppose that a Point has been established and the Point number is 4. Since it is a Point roll, you can make a Don't Come bet by placing chips on the "Don't Come" portion of the layout.

Now, even though it is still a Point roll (the Point is 4), the next roll of the dice is considered the "Comeout" for your Don't Come bet:

WIN if a 2 or 3, is rolled LOSE if a 7 or 11 is rolled. If a 4, 5, 6, 8, 9 or 10 is rolled, it becomes the <u>Don't Come Point</u> (a Point_for your Don't Come bet only); your chips are moved to a place next to this Point number.

If a Point is established for your Don't Come bet, in order to WIN you must now roll a 7 BEFORE rolling this Point number again.

Don't Come Free Odds

Description:

This bet can only be made in conjunction with a Don't Come bet, and it can only be made after this Come bet has established its point. Free odds bets may be reduced or removed at any time.

Decision:

WINS if the Don't Come bet's point is repeated.

LOSES if a 7 is rolled.

Payoff:

POINT #	True Odds	Payoff	Vigorish
6 or 8	5 to 6	5 to 6	0.0%
5 or 9	2 to 3	2 to 3	0.0%
4 or 10	1 to 2	1 to 2	0.0%

Place 4

Description:

This is a multiple-roll bet and can be made and removed at any time during the game. Due to the payoff odds, you must be able to divide your bet amount evenly by 5 (5, 10, 15, 20, etc.).

Decision:

WINS if a 4 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 2 to 1 Payoff = 9 to 5 Vigorish = 6.66%

Description:

This is a multiple-roll bet and can be made and removed at any time during the game. Due to the payoff odds, you must be able to divide your bet amount evenly by 5 (5, 10, 15, 20, etc.).

Decision:

WINS if a 5 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 3 to 2Payoff = 7 to 5Vigorish = 4.00%

Description:

This is a multiple-roll bet and can be made and removed at any time during the game. Due to the payoff odds, you must be able to divide your bet amount evenly by 6 (6, 12, 18, 24, etc.).

Decision:

WINS if a 6 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 6 to 5Payoff = 7 to 6Vigorish = 1.52%

Description:

This is a multiple-roll bet and can be made and removed at any time during the game. Due to the payoff odds, you must be able to divide your bet amount evenly by 6 (6, 12, 18, 24, etc.).

Decision:

WINS if an 8 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 6 to 5Payoff = 7 to 6Vigorish = 1.52%

Description:

This is a multiple-roll bet and can be made and removed at any time during the game. Due to the payoff odds, you must be able to divide your bet amount evenly by 5 (5, 10, 15, 20, etc.).

Decision:

WINS if a 9 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 3 to 2Payoff = 7 to 5

Vigorish = 4.00%

Description:

This is a multiple-roll bet and can be made and removed at any time during the game. Due to the payoff odds, you must be able to divide your bet amount evenly by 5 (5, 10, 15, 20, etc.).

Decision:

WINS if any combination of 10 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 2 to 1 Payoff = 9 to 5 Vigorish = 6.66%

Description:

This is a multiple-roll bet and can be made and removed at any time during the game.

However, the casino requires that you pay an additional charge of 5% of the bet amount at the time this bet is made (a \$20 bet becomes a bet of \$21). This 5% charge MUST be paid regardless of whether the bet wins or loses. In return, the casino will pay off your bet at true odds (it keeps the 5% charge). The 5% charge must be in whole dollar amounts.

Decision:

WINS if a 4 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 2 to 1 Payoff = 2 to 1 (casino keeps 5% charge) Vigorish = 4.76%

Description:

This is a multiple-roll bet and can be made and removed at any time during the game.

However, the casino requires that you pay an additional charge of 5% of the bet amount at the time this bet is made (a \$20 bet becomes a bet of \$21). This 5% charge MUST be paid regardless of whether the bet wins or loses. In return, the casino will pay off your bet at true odds (it keeps the 5% charge). The 5% charge must be in whole dollar amounts.

Decision:

WINS if a 5 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 3 to 2 Payoff = 3 to 2 (casino keeps 5% charge) Vigorish = 4.76%

Description:

This is a multiple-roll bet and can be made and removed at any time during the game.

However, the casino requires that you pay an additional charge of 5% of the bet amount at the time this bet is made (a \$20 bet becomes a bet of \$21). This 5% charge MUST be paid regardless of whether the bet wins or loses. In return, the casino will pay off your bet at true odds (it keeps the 5% charge). The 5% charge must be in whole dollar amounts.

Decision:

WINS if a 6 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 6 to 5 Payoff = 6 to 5 (casino keeps 5% charge) Vigorish = 4.76%

Description:

This is a multiple-roll bet and can be made and removed at any time during the game.

However, the casino requires that you pay an additional charge of 5% of the bet amount at the time this bet is made (a \$20 bet becomes a bet of \$21). This 5% charge MUST be paid regardless of whether the bet wins or loses. In return, the casino will pay off your bet at true odds (it keeps the 5% charge). The 5% charge must be in whole dollar amounts.

Decision:

WINS if an 8 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 6 to 5 Payoff = 6 to 5 (casino keeps 5% charge) Vigorish = 4.76%

Description:

This is a multiple-roll bet and can be made and removed at any time during the game.

However, the casino requires that you pay an additional charge of 5% of the bet amount at the time this bet is made (a \$20 bet becomes a bet of \$21). This 5% charge MUST be paid regardless of whether the bet wins or loses. In return, the casino will pay off your bet at true odds (it keeps the 5% charge). The 5% charge must be in whole dollar amounts.

Decision:

WINS if a 9 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 3 to 2 Payoff = 3 to 2 (casino keeps 5% charge) Vigorish = 4.76%

Description:

This is a multiple-roll bet and can be made and removed at any time during the game.

However, the casino requires that you pay an additional charge of 5% of the bet amount at the time this bet is made (a \$20 bet becomes a bet of \$21). This 5% charge MUST be paid regardless of whether the bet wins or loses. In return, the casino will pay off your bet at true odds (it keeps the 5% charge). The 5% charge must be in whole dollar amounts.

Decision:

WINS if a 10 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 2 to 1 Payoff = 2 to 1 (casino keeps 5% charge) Vigorish = 4.76%

Description:

This multiple-roll bet is the opposite of the Buy 4 and can be made and removed at any time during the game.

However, the casino requires that you pay an additional charge at the time this bet is made. This additional charge is equal to 5% of the payoff. (For example, a \$40 Lay 4 bet has a payoff of **1 to 2** or \$20. 5% of \$20 = \$1, so the bet amount becomes \$40 + \$1 = \$41.)

This 5% charge MUST be paid regardless of whether the bet wins or loses. In return, the casino will pay off your bet at true odds (it keeps the 5% charge). The 5% charge must be in whole dollar amounts.

Decision:

WINS if a 7 is rolled.

LOSES if a 4 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 1 to 2 Payoff = 1 to 2 (casino keeps 5% charge) Vigorish = 2.44%

Description:

This multiple-roll bet is the opposite of the Buy 4 and can be made and removed at any time during the game.

However, the casino requires that you pay an additional charge at the time this bet is made. This additional charge is equal to 5% of the payoff. (For example, a \$30 Lay 5 bet has a payoff of **2 to 3** or \$20. 5% of \$20 = \$1, so the bet amount becomes \$30 + \$1 = \$31.)

This 5% charge MUST be paid regardless of whether the bet wins or loses. In return, the casino will pay off your bet at true odds (it keeps the 5% charge). The 5% charge must be in whole dollar amounts.

Decision:

WINS if a 7 is rolled.

LOSES if a 5 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 2 to 3 Payoff = 2 to 3 (casino keeps 5% charge) Vigorish = 3.23%

Description:

This multiple-roll bet is the opposite of the Buy 4 and can be made and removed at any time during the game.

However, the casino requires that you pay an additional charge at the time this bet is made. This additional charge is equal to 5% of the payoff. (For example, a \$24 Lay 6 bet has a payoff of **5 to 6** or \$20. 5% of \$20 = \$1, so the bet amount becomes \$24 + \$1 = \$25.)

This 5% charge MUST be paid regardless of whether the bet wins or loses. In return, the casino will pay off your bet at true odds (it keeps the 5% charge). The 5% charge must be in whole dollar amounts.

Decision:

WINS if a 7 is rolled.

LOSES if a 6 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 5 to 6 Payoff = 5 to 6 (casino keeps 5% charge) Vigorish = 4.00%

Description:

This multiple-roll bet is the opposite of the Buy 4 and can be made and removed at any time during the game.

However, the casino requires that you pay an additional charge at the time this bet is made. This additional charge is equal to 5% of the payoff. (For example, a \$24 Lay 8 bet has a payoff of **5 to 6** or \$20. 5% of \$20 = \$1, so the bet amount becomes \$24 + \$1 = \$25.)

This 5% charge MUST be paid regardless of whether the bet wins or loses. In return, the casino will pay off your bet at true odds (it keeps the 5% charge). The 5% charge must be in whole dollar amounts.

Decision:

WINS if a 7 is rolled.

LOSES if an 8 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 5 to 6 Payoff = 5 to 6 (casino keeps 5% charge) Vigorish = 4.00%

Description:

This multiple-roll bet is the opposite of the Buy 4 and can be made and removed at any time during the game.

However, the casino requires that you pay an additional charge at the time this bet is made. This additional charge is equal to 5% of the payoff. (For example, a \$30 Lay 9 bet has a payoff of **2 to 3** or \$20. 5% of \$20 = \$1, so the bet amount becomes \$30 + \$1 = \$31.)

This 5% charge MUST be paid regardless of whether the bet wins or loses. In return, the casino will pay off your bet at true odds (it keeps the 5% charge). The 5% charge must be in whole dollar amounts.

Decision:

WINS if a 7 is rolled.

LOSES if a 5 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 2 to 3 Payoff = 2 to 3 (casino keeps 5% charge) Vigorish = 3.23%

Description:

This multiple-roll bet is the opposite of the Buy 4 and can be made and removed at any time during the game.

However, the casino requires that you pay an additional charge at the time this bet is made. This additional charge is equal to 5% of the payoff. (For example, a \$40 Lay 10 bet has a payoff of **1 to 2** or \$20. 5% of \$20 = \$1, so the bet amount becomes \$40 + \$1 = \$41.)

This 5% charge MUST be paid regardless of whether the bet wins or loses. In return, the casino will pay off your bet at true odds (it keeps the 5% charge). The 5% charge must be in whole dollar amounts.

Decision:

WINS if a 7 is rolled.

LOSES if a 4 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 1 to 2 Payoff = 1 to 2 (casino keeps 5% charge) Vigorish = 2.44%

Field

Description:

This is a one-roll bet and can be made at any time during the game. The payoff depends on settings in the "Set Up Casino" window (to access this window, select "Options" and then "Casino").

Decision:

WINS if a 2, 3, 4, 9, 10, 11 or 12 is rolled.

LOSES if a 5, 6, 7 or 8 is rolled.

Payoff -- (<u>Field 2 Pays</u> = "Double" and <u>Field 12 Pays</u> = "Double"):

Payoff = 2 to 1 (if 2 or 12 is rolled). Payoff = 1 to 1 (if 3, 4, 9, 10 or 11 is rolled). Vigorish = 5.55%.

Payoff -- (<u>Field 2 Pays</u> = "Double" and <u>Field 12 Pays</u> = "Triple"):

Payoff = 2 to 1 (if a 2 is rolled).

Payoff = 3 to 1 (if a 12 is rolled).

Payoff = 1 to 1 (if a 3, 4, 9, 10 or 11 is rolled).

Vigorish = 2.77%
Big 6

Description:

This is a multiple-roll bet and can be made and removed at any time during the game.

Decision:

WINS if a 6 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 6 to 5 Payoff = 1 to 1 Vigorish = 9.09%

Big 8

Description:

This is a multiple-roll bet and can be made and removed at any time during the game.

Decision:

WINS if a 8 is rolled.

LOSES if a 7 is rolled.

If any other combination is rolled, no decision is made and the dice are rolled again.

Payoff:

True odds = 6 to 5 Payoff = 1 to 1 Vigorish = 9.09%

Overdraft Warning

This message warns you when your strategy attempts to make a bet that exceeds your chips in the Bankroll Rail. Choose one of the options provided and click OK.

Marker Dialog

This dialog box allows you to "borrow" money to cover a bet that exceeds your chips in the Bankroll Rail. Choose one of the options provided and click OK.

Free Odds

Choosing **Setup Strategy...Bets** from the **StrategyMaster** menu will display the Betting Strategy dialog box. Select the check box next to the type of bet you want that has Free Odds (i.e. Pass, Don't Pass, Come or Don't Come). The Make A Bet dialog box will appear. Click on the Free Odds button to display the Free Odds dialog box.

You have great flexibility in setting up your *free odds* bets when making a Pass, Don't Pass, Come or Don't Come bets. For *each* established Point. there are five selections to choose from:

- 1) No odds No free odds bets will be made
- 2) Single odds StrategyMaster will automatically calculates your single odds bet.
- 3) Double odds StrategyMaster will automatically calculates your double odds bet.
- 4) Triple odds StrategyMaster will automatically calculates your triple odds bet.
- 5) Custom odds You manually type in any free odds amount you want.

Ordering CASINO PLANNER

Order CASINO PLANNER for Craps within two weeks to receive additional \$5 discount off the low sale price of \$34.95*, regularly \$59.95.

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Also, visit our home page at http://igsware.com for latest information about IGS and Casino Planner, as well as, other cool casino sites.

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About CASINO PLANNER[™] for Craps...

CASINO PLANNER is an advanced interactive multimedia game and *powerful* application. This software marks the beginning of a new era in gambling in which players for the first time can use their home personal computer to prepare for a trip to the casino and thus *dramatically* increase their chances of winning. This software breakthrough was achieved by using many exclusive features not found in any other product.

CASINO PLANNER is introducing a new standard called the WinRatingTM. The WinRating allows you to know what your chances are of winning in terms of percent *before* stepping up to the tables and without risking your hard-earned bankroll. If you are willing to put a greater amount of money at risk than you are to win then you can actually have a WinRating of greater than 50%. The significance of this is that even though nobody is guaranteed to win, the WinRating allows you to know <u>in advance</u> what your chances of winning are and you <u>can</u> have the advantage of winning over the casino for a given session at the table.

CASINO PLANNER has powerful capabilities not found in any other software on the market today.

For a given strategy, you will:

- Learn advantages and disadvantages about your strategy.
- Learn what your **chances of winning** are in terms of percent. (WinRatingTM)
- Learn how to determine a realistic WinGoal.
- Learn what the chances are of reaching your Win Goal. (WinGoal RatingTM)
- Learn how much **bankroll** is needed to play your strategy.
- Learn how much **Playtime** you can expect from your strategy.
- Learn what the expected "**cost per hour**" is to play your strategy.
- Learn what the House Advantage is for your strategy. (VigRatingTM)
- Learn when the best time is to **stop** playing to maximize your winnings.
- Learn how to have WinRatings of greater than 50%.

You will:

- *Objectively* compare crap strategies in the matter of minutes.
- Create and save your own strategies
- · Print your results or export to other programs to create graphs and charts
- Learn how to get vigs as low as 0.275%
- Learn how to play for a minimum amount of time(i.e. 4, 8 12 hours), this is ideal for Junket Players.

CASINO PLANNER:

- Provides you with over 50 of the best-known strategies
- Automatically notifies and adjusts any incorrect bet amounts
- Allows for all bet types (including Free odds, Buy and Lay bets)
- Allows you to customize payoff odds to match your favorite casinos. Many of the most popular casino's are provided with the software.
- User-friendly interface

"The Best Strategy For Winning Is PREPARATION!"

International Gambling Software, Inc.; 12319 S. Orange Blossom Trail, Suite 261; Orlando, FL 32837 (407)826-4817

CASINO PLANNER for Craps Features

- Craps Tutor teaches people new to the game to *how to play*.
- StrategyMaster teaches advanced players to *how to win*.
- There are two modes of operation:
 - 1. Game Mode
 - 2. StrategyMaster mode
- Sound options include:
 - 1. Dealer's voice heard just like at a real crap table!
 - 2. Sound effects (dice, bets being placed or removed, etc...)
 - 3. Jukebox style Music (preloaded or use your own MIDI sound files or use CD music disc)
 - 4. Casino crowd sounds
- Custom strategies can be saved and retrieved
- Different casinos can be saved and retrieved
- Strategy Results Options include:
 - 1. Overall
 - 2. Each session
 - 3. Bankroll graph
 - 4. Shooter stats
- Hot / Cool table indicator
- Player and stickman animation at the table
- 12 animated players to choose from, each with their own personality and mannerisms
- Dice pass from one player to another after shooter seven's out
- Multimedia PC (MPC) compatible
- User friendly online help
- 256 color graphics

Exclusive features include:

- StrategyMaster A powerful tool that lets the you test crap strategies in the matter of minutes.
- **Money Management Assistant** Automatically determines a realistic WinGoal and required bankroll for a given strategy.
- Bet Sequencer Allows bets to automatically be increased or decreased.
- Fundamental Five for a given strategy:
 - 1. WinRating What your chances are of winning
 - 2. WinGoal Rating What your chances are of reaching your Win Goal
 - 3. Average Playtime at table Expected playtime at the table
 - 4. Average Net when leaving table Expected Win / Loss at the table
 - 5. VigRating House advantage for entire strategy

The Fundamental Five -- "Don't Play at the Casino Without It!"

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Shortcuts

It is strongly recommended to FIRST read the entire manual before using CASINO PLANNER for Craps. However, for those of you who want to get started right away, the following describes the *minimum* you need to know to use the software.

Related Topics:

How to Play Craps Crap Table Unlabeled Bets on the Table Benefits of the Gray Table Instant Help on All Crap Bets Game Mode How to Make a Bet How to Remove a Bet How to Roll the Dice StrategyMaster Mode

How to Play Craps

The Comeout roll is the first roll of a new game. This is signified by a round puck facing black side up and is positioned off to the side of the main layout of the table. If a Comeout roll is 7,11,2,3, or 12 then the "game" is over and the next Comeout roll begins a new game . On a Comeout roll if a 4,5,6,8,9, or 10 is rolled, a Point number is established and the puck is moved on top of the Point number with the white side facing up.

DEFINITION: *Comeout roll*. The Comeout roll is always the FIRST roll of a new craps game and is signified by a round puck facing black side up and is positioned off to the side of the table.

When a Point is established, the Comeout roll is over and it is now a Point roll. It remains a Point roll as the dice are rolled again and again until either the Point number is repeated or a 7 is rolled. If any of these two events occurs, the game is over and a new game starts again with the Comeout roll.

DEFINITION: *Point roll*. Any roll AFTER the first roll of a new game (i.e. first roll is Comeout roll) and is signified by a round puck facing white side up and is positioned on the Point number established from the Comeout roll.

The following flow diagram summarizes how simple it is to play craps. Notice how the game of craps is played *independent* of any bets on the crap table.



Flow Diagram of Craps Game

There are over forty bet options that can be made, but as a player, you only need to play *one* bet. It is, however, common to see players using multiple bets during the course of a game.

RULE: There are over forty different bets to choose from in the game of craps. For each crap game, your are only required to play at least one bet (or a combination of bets) that meets the table bet minimum, typically \$5.

RECOMMENDATION: If you are a beginner, it is strongly recommended that you only focus on the Pass Line bet. Once you master the Pass Line bet, you will be ready to explore other bet options.

The Pass Line bet is without question the most popular crap bet and it has one of the lowest vigs (house advantage) in the entire casino. Therefore if you are a beginner, you should master the Pass Line bet before learning other bets. Once you are ready to learn about other bet options, choose **Contents** under the **Help** menu and see heading titled **Crap Bets**.

Crap Table

The IGS crap table has the authentic layout of a real casino crap table. However, only one half of the IGS crap table is visible since the other half is a mirror image of the first half. Also, you will see how to play at the crap table with other animated players -- each with their own personality.

RECOMMENDATION: If the IGS crap table colors look a little dark, adjust the brightness knob on your monitor appropriately. Also, 256 colors will look **much better** than 16 colors.

Unlabeled Bets on the Table

Unfortunately, a real crap table only has *some* of the bets labeled with text on the layout. Bets that don't have text include, Place bets, Buy bets, Lay bets, Come and associated Free Odds bet, as well as, Don't Come bets and associated Free Odds bets. That's seven type of bets with that do not have a label on a *real* crap layout. For the IGS crap table, the following diagram shows areas where to click with the mouse button to make various bets that are not labeled on the table.



For a given bet type, only *one* example was given in the table. For example, there are six different Place bets on the Table (i.e. Place 4, 5, 6, 8, 9 and 10). Only the area where to make a Place 10 is shown in the above diagram, other Place bets are made in a similar manner. Notice the Place bet area covers the left most 50% area of where the 10 is marked on the table. The right most 50% area is for the Buy 10 bet. The other 5 numbers (i.e. 4, 5, 6, 8 and 9) follow the same convention for Place and Buy bets. The gray crap table distinguishes the "unlabeled" bets by using two different shades of gray.

Benefits of the Gray Table

From the **Options** menu, choose **Casino**. In the lower left side of the dialog, select the gray table and click OK. Now you will see a gray crap table. Notice there are light gray and dark gray areas on the layout. These different shadings of gray distinguish unlabeled bets and show where one bet area starts and another begins. Placing unlabeled bets is therefore more intuitive with the gray table. Also, the gray table makes it easier to see the colored chips resting on the table. For these reasons, you may want to play with the gray table most of the time.

Instant Help on All Crap Bets

There are times when you are interested in the certain aspects of a particular bet (i.e. you forgot payoff odds). Help for all the bets on the IGS crap table is just a mouse click away.

RECOMMENDATION: Hold down the SHIFT key and click with the *left* mouse button on the IGS crap table for instant On-line Help for the bet you are interested in.

Help information on a specific crap bet includes definition, true odds, payoff odds, house advantage, decision, and vigorish. When you are done with the help, go to the **File** menu and choose **Exit**.

RECOMMENDATION: While using the On-line Help, hold the ALT key and then press the TAB key to "toggle" you back and forth between On-line Help and the IGS crap table.

Game Mode

When using CASINO PLANNER, you can be in one of two modes -- Game Mode or StrategyMaster Mode. You can change from one mode to the other at any time, but this will cause a reset. From the **Options** menu, select **Mode** to change setting. The current mode of CASINO PLANNER is always displayed in the Control Panel located below the IGS crap table.

DEFINITION: *Game Mode*. All bets must be made <u>manually</u>, one roll at a time, just like you would in a real casino

This mode allows you to practice playing a strategy after you have found one you liked from the StrategyMaster mode. Therefore, you can play on your own as if you were at a real crap table for the benefit of preparing for a trip to a *real* casino.

How to Make a Bet

To make a bet in a *real* casino you would take chips out of your bankroll, assembling them in your hand, until you have the amount you want. Then you would put those chips on the table. This method is very similar with CASINO PLANNER except that you must use the bet rail, not your hand, to assemble your bet before rutting it on the table.

before putting it on the table.	
Bankroll	Det Rall
Bankroll Amount	 Bet Rail Amount

How to take chips out of your Bankroll Rail and assemble them in the Bet Rail:

- 1. To add chips to the Bet Rail, use the left mouse button and click on the chip color in the Bankroll Rail that you would like to add to the Bet Rail. Each time you click the mouse on a chip color, it will be added to the Bet Rail.
- 2. To remove a chip from the Bet Rail, use the right mouse button and click on the chip color in the Bankroll Rail that you would like to remove from the Bet Rail. Each time you click the mouse on a chip color in the Bankroll Rail, it will be removed from the Bet Rail.
- 3. To remove all chips from the Bet Rail, use the left or right mouse button and click anywhere in the empty space just to the right of the chips in the Bankroll Rail.
- 4. An alternate way to assemble a bet in the Bet Rail is to highlight the Bet Rail amount which is represented by a number and directly type in the bet amount desired, then hit the TAB key.



5. Make a \$25 "Pass Line" bet by moving the cursor (hand) so that the "index finger" is over the upper 50% of the Pass Line area on the table and click with the *left* mouse button. You now have a \$25 Pass Line bet on the table.

Use this same procedure to make bets anywhere on the IGS crap table.

RULE: Use the *left* mouse button to manually make a bet on the IGS crap table.

How to Remove a Bet

To remove a bet on the IGS crap table simply move the cursor (hand) over the bet and click with the *right* mouse button. Try this by moving the cursor over the \$25 Pass Line bet and then click with the *right* mouse button. Now the bet is removed. Move the cursor over the Pass Line area and click with the *left* mouse button. The \$25 in the Bet Rail will now be on the Pass Line.

RULE: Use the *right* mouse button to remove a bet.

How to Roll the Dice

Now that that we have a \$25 Field bet on the table, we are ready to roll the dice. A pair of red dice can be found on the left side of the IGS crap table. There are three different ways to manually roll the dice.



1. Click on the one of the two dice with the *left* mouse button for a random roll.

Click on the one of the two dice with the *right* mouse button. A dialog box will pop up as shown below.



3. Click on the "Roll Dice"

2.

Enter the dice number you want for the next roll. When you click OK the dice will be rolled with the number you have intructed.



button located in the Control Panel for a random roll.

StrategyMaster Mode

When using CASINO PLANNER, you can be in one of two modes -- Game Mode or StrategyMaster Mode. You can change from one mode to the other at any time, but this will cause a reset. From the **Options** menu, select **Mode** to change setting. The current mode of CASINO PLANNER is always displayed in the Control Panel located below the IGS crap table.

DEFINITION: *StrategyMaster Mode*. All bets are made <u>automatically</u> according to a predefined Betting Strategy that has been entered through the convenient "Make A Bet" window.

In the StrategyMaster Mode, CASINO PLANNER will *automatically* make ALL your bets as defined by a Betting Strategy that is saved in memory. StrategyMaster can simulate up to 20,000 consecutive sessions in a short period of time. After a simulation is completed, StrategyMaster will tally the results and provide you a wide range of important information about your Strategy. With this information you will be able to "fine tune" your Strategy for optimum performance (i.e. WinRating, Playtime, cost, etc.), or objectively compare it to other strategies.

For more information on StrategyMaster, read the "StrategyMaster Mode" section of the manual or on-line help.

Appendix A - How to Use the Bet Sequencer

RECOMMENDATION: The Bet Sequencer is an advanced feature of CASINO PLANNER. It is not recommended to use this feature until you are comfortable using "fixed bets" with StrategyMaster.

Some of the most famous crap strategies are based on a <u>sequence</u> of bets. In other words, a particular bet will be increased or decreased depending on whether the bet has just won or lost. The Bet Sequencer may be used with any bet on the IGS crap table.

To use the Bet Sequencer, you must first bring up a "Make-A-Bet" window. For this example, lets bring up the Field "Make-A-Bet" window. Move the cursor over the IGS crap table, hold down the CNTRL key and click with the left mouse button on top of the Field bet area of the table. The "Make A Bet on the Field" window will appear as shown below.



Click on the Bet Sequencer **Bet Sequencer...** button. The "Edit a Betting Sequence" dialog box will appear as shown below:

{ewc D2HTools, D2H_256Color, help0069.bmp}

Rules for Using the Bet Sequencer

There is two rules that must be followed when using the Bet Sequencer.

- 1. Both the "IF I WIN" and "IF I LOSE" sequences MUST end with a box that contains the letter R followed by a box that contains a "repeat number".
- 2. A bet entry of "Zero" (\$0) is not allowed anywhere in the sequence.

The two sequences, whether they are used or not, must end in \mathbf{R} followed by a number. \mathbf{R} followed by 1 means repeat the last bet. \mathbf{R} followed by 2 means repeat the last two bets and so on. The letter \mathbf{R} simply tells StrategyMaster where to go for the next bet when it reaches the end of a bet sequence. Any entry after \mathbf{R} and the "repeat number" will be ignored.

Initial Bet

The "Initial Bet" box shows the amount of the *first* bet in the sequence. This amount is also be shown in the "Make A Bet" window.

IF I WIN Sequence

Use the "IF I WIN" sequence boxes to increase or decrease your bets when you are winning. If a bet loses in the middle of the win sequence then the sequence starts back over at the "Initial Bet" amount. The win sequence is useful for setting up such systems as the *Anti-Martingale* and *Paroli* (or *Great Paroli*) and also for press bets.

If I LOSE Sequence

Use the "IF I LOSE" sequence boxes to increase or decrease your bets when you are winning. If a bet wins in the middle of the lose sequence then the sequence starts back over at the "Initial Bet" amount. The lose sequence is useful for setting up such systems as *Martingale*, *Grand Martingale* (*Rothstein*), *Short-Leash Grand Martingale* (*Short-Leash Rothstein*), and the *Field System* (using sequenced betting).

Bet Sequencer Example #1

Let's see how to setup the Bet Sequencer for a system that is <u>similar</u> to *Martingale*. The basic idea behind *Martingale* systems is to start out with an initial bet and stay at that amount as long as you are winning. Each time your bet loses, you double your bet until the bet wins, at which time the bet is starts over again at the initial amount.

For this example, we will setup a strategy that has an initial bet of \$5 on the Field. Each time this Field bet WINS, the bet will remain at \$5. Each time this Field bet LOSES, the next bet will be double the previous amount. When the bet reaches \$40, the strategy will return back to its initial bet amount of \$5. The "Edit a Betting Sequence" dialog box below shows how this sequence should be entered.

{ewc D2HTools, D2H_256Color, help0070.bmp}

This dialog box interacts StrategyMaster start out with an initial bet of \$5 on the Field bet. Let's say the **first** roll is 3 and therefore the bet wins. The Bet Sequencer will then enter the "IF I WIN" sequence. The first box this sequence contains the letter **R**. Therefore, StrategyMaster will look at the next box immediately after the R to see how many bets to "Repeat". In this case, the **R** is followed by a "1". This means StrategyMaster will go back and "Repeat" the last bet, in this case that would be the Initial Bet, \$5. Now StrategyMaster is back at the Initial Bet for the next roll.

Let's say the **second** roll is a 7 and therefore the bet loses. The Bet Sequencer will then go from the Initial Bet and enter the "IF I LOSE" sequence. The first box of this sequence contains a bet amount of \$10. Therefore, StrategyMaster will increase your Field bet from \$5 to \$10 for the next roll. Now StrategyMaster is at the first box in the "IF I LOSE" sequence.

Let's say the **third** roll is a 6 and therefore the bet loses again. The Bet Sequencer will then go from the first box in the "IF I LOSE" sequence to the second box in the "IF I LOSE" sequence. The second box of this sequence contains a bet amount of \$20. Therefore, StrategyMaster will increase your Field bet from \$10 to \$20 for the next roll. Now StrategyMaster is at the second box in the "IF I LOSE" sequence.

Let's say the **fourth** roll is a 8 and therefore the bet loses again. The Bet Sequencer will then go from the second box in the "IF I LOSE" sequence to the third box in the "IF I LOSE" sequence. The third box of this sequence contains a bet amount of \$40. Therefore, StrategyMaster will increase your Field bet from \$20 to \$40 for the next roll. Now StrategyMaster is at the third box in the "IF I LOSE" sequence.

Let's say the **fifth** roll is a 8 and therefore the bet loses again. The Bet Sequencer will then go from the third box in the "IF I LOSE" sequence to the fourth box in the "IF I LOSE" sequence. The fourth box of this sequence contains the letter **R**. Therefore, StrategyMaster will look at the box immediately after the **R** to see how many bets to "Repeat". In this case, the **R** is followed by a "4". This means StrategyMaster will go back and "Repeat" the last four bets. In this case, that would mean going back past the \$40, past the \$20, past the \$10 and stopping at \$5, which happens to be the Initial Bet. Therefore, StrategyMaster will decrease your Field bet from \$40 to \$5 for your next bet. Now StrategyMaster is back at the Initial Bet for the next roll.

If you lose a the **sixth** roll, your next bet will be \$10 but if you win on the sixth roll, your next bet will go back to the Initial Bet of \$5 because the "IF I WIN" sequence is **R** followed by 1 (repeat last bet). StrategyMaster is following exactly how the strategy was defined.

Bet Sequencer Example #2

In this next example, let's say you have a strategy that evolves pressing your Place 8 bet when it wins. This strategy will start out with an initial bet of \$6. After your first hit (win) you want the same bet of \$6. After your second hit (win) you want to press your bet to \$12. After your third hit (win)) you want the same bet of \$12. After your fourth hit (win) you want to press your bet to \$24 and so on.

Therefore, the betting sequence is "same bet", "press", "same bet", "press", "same bet", "press", etc. The "Edit a Betting Sequence" dialog box below shows how this sequence should be entered

_	Edit a Betting Sequence on Place 8									
	Enter your Initial bet. Then enter your winning and/or losing sequences.									
	Initial bet 6									
	If I WIN I want to bet this sequence 1st 2nd 3rd 4th 5th 6th 7th 8th 9th 10th									
	6	12	12	24	24	48	48	96	R	1
	If I LOSE I want to bet this sequence 1st 2nd 3rd 4th 5th 6th 7th 8th 9th 10th									
	R	1	-	-	-	-	-	-	-	-
	All sequences MUST end with letter R followed by a "repeat number" in the next Field.									

Bet Sequencer Example #3

In this next example, let's say you have a strategy that evolves a different pressing method for your Place 8 bet when it wins. This strategy will start out with an initial bet of \$6. After your first hit (win) you want to press your bet to \$12. After your second hit (win) you want to press your bet again to \$18. After your third hit (win) you want to press your bet again to \$24. After your fourth hit (win) you want to press your bet again to \$30 and then stay at this amount until the bet loses.

Therefore, the betting sequence is \$6, \$12, \$18, \$24, \$30 and then stay at \$30 until bet loses. The "Edit a Betting Sequence" dialog box below shows how this sequence should be entered.

_	Edit a Betting Sequence on Place 8									
	Enter your Initial bet. Then enter your winning and/or losing sequences.									
	Initial bet 6									
	If I WIN I want to bet this sequence									
	1st	2nd	3rd	4th	5th	6th	7th	8th	9th	10th
	6	12	18	24	30	R	1	-	-	-
	If I LOSE I want to bet this sequence									
	Ist	Zna	3ra	4th	510	6th	700	8th	9th 1	
	R	1	-	-	-	-	-	-	-	
	All sequences MUST end with letter R followed by a "repeat number" in the next Field.									
	V Cancel									

Bet Sequencer Example #4

In this next example, let's say you have a strategy that evolves a different pressing method but this time on the Place 5. This strategy will start out with an initial bet of \$10 on the Place 5. After your first hit (win) you stay at \$10, after your second hit (win) you press your bet to \$20. After your third hit (win) you decrease your bet back to 10. After your forth hit (win) you want to press to \$20 again and so.

This pattern is followed (\$10, \$10, \$20, \$10, \$20, etc.) until the bet loses. The "Edit a Betting Sequence" dialog box below shows how this sequence should be entered.

	Edit a Betting Sequence on Place 5								
Enter your Initial bet. Then enter your winning and/or losing sequences. Initial bet 10									
1st	If I WIN I want to bet this sequence 1 st 2nd 3rd 4th 5th 6th 7th 8th 9th 10th								
10	20	R	2	-	-	-	-	-	-
1st	2nd	lf I 3rd	LOSE I 4th	want to 5th	bet this 6th	sequen 7th	ce 8th	9th	10th
R	1	-	-	-	-	-	-	-	-
All sequences MUST end with letter R followed by a "repeat number" in the next Field.									

Summary

The Bet Sequencer has allot of flexibility and is easy to setup. These examples were meant to show you the basics of the Bet Sequencer. It's up to you to come up with your own ideas and betting patterns. After running StrategyMaster, refer to the Overall Results window (located under the **StrategyMaster** menu) to clearly see what works and what doesn't work when it comes to pressing Place bets, as well as, other types of betting sequences.

Appendix B - How to Adjust "Accuracy of Results"

StrategyMaster is based on Monty Carlo simulations to give you reliable results about your strategy. Since StrategyMaster is based on a simulation, it is possible for you to control how accurate the results will be. In other words, the longer a simulation run, the more accurate the results will be. However, more accurate results means more waiting on your part for the simulation to complete. Therefore, there has to be some middle ground on how long the simulation run should be versus how accurate the results will be.

A typical Results window which contains the information from a StrategyMaster run is shown below:

Saturapy: Mexter RESULTS for a 5 Page 1 line	
The Fundamental Flor# for your miceleaped	
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Sessions per Run /	Total PLAYTIME for /
Five-Star Rating	entire StrategyMaster run.
r tre-plat starting	

Related Topics:

<u>Five-Star Rating</u> Determining the "Number of Sessions per Run

Five-Star Rating

CASINO PLANNER uses the commonly known *Five-Star Rating* to help indicate the accuracy of the results. The more hours per simulation, the more accurate the results will be. Therefore, as a guide to help you quickly understand the accuracy of the results, CASINO PLANNER has defined the *Five-Star Rating* as shown below:

*	=>	"Rough Estimate"	0 - 100	Total PLAYTIME hours
**	=>	"Fair"	100-750	Total PLAYTIME hours
***	=>	"Good"	750 - 5,000	Total PLAYTIME hours
****	=>	"Very Good"	5,000 - 40,000	Total PLAYTIME hours
****	=>	"Excellent"	40,000 +	Total PLAYTIME hours

OBSERVATION: The Five-Star Rating is dependent soly on Total PLAYTIME.

Determining the "Number of Sessions per Run

As you can see, the *Five-Star Rating* is directly tied into the total number of PLAYTIME hours for a StrategyMaster run. IGS recommends to look at results that have *at least* a rating of "three-stars" (i.e. Good). There is only <u>one</u> value that you can use to control the "Total PLAYTIME" hours for a StrategyMaster run. This control is called "Number of Sessions per Run". From the **Options** menu, choose **StrategyMaster**. The "StrategyMaster Options" dialog box will appear as shown below:



This is the only value that you can adjust to control the Total PLAYTIME hours for a StrategyMaster run and thus control the accuracy of the results.

The default value for the "Number of Sessions per Run" is 1000. This will probably be sufficient for most strategies to have a rating of at least "three stars". If you do not get at least a rating of "three-stars" or you would like to get a higher rating, you can determine the right value for the "Number of sessions per Run":

Number of Sessions per Run (min.) = <u>Desired Total PLAYTIME hours</u>

Avg. PLAYTIME (from previous Fundamental Five results)

 SHORTCUT:
 If you're not into math, you can estimate the "Number of Sessions per Run" by simply entering a value that equals the desired "Total PLAYTIME":

 Number of Sessions per Run (estimate)
 Desired Total PLAYTIME hours

Appendix C - Vig, VigRating and NET-per-Hour

<u>VigRating</u> Entertainment Value and "NET-per-Hour"

Vigorish

The vigorish is a term that every player should be familiar with, but unfortunately most players don't understand its significance. Furthermore, it's amazing how many people go to the casino and expect to win -- without knowing anything about this enigmatic term. So, what in the world is the "vig" anyway and why is it so important?

DEFINITION: *Vigorish*. The vigorish, or vig for short, is the advantage that the casino has over the player for each individual bet on the crap table. It is a measure of how fast you can *expect* to lose your money based on the total amount of money wagered on a specific crap bet.

The Vigorish is an indicator of how fast a player can lose his money. Vigorish, or "vig," is the commission the casino charges for each bet. This is the only way in which they make their profits. The term "Vigorish" is an older expression that is not used much in casinos today. But, it is often referred to in many other ways -- "advantage", "house advantage", "casino advantage", "commission", "edge", "the house edge", "percentage", "house percentage", or simply the "PC".

The vig is expressed as a percentage. For example, the Pass Line bet has a vig of 1.41%. This means that for every \$100 you bet on the Pass Line, the casino will keep an *average* of \$1.41. This does not mean that you have to fork over \$1.41 every time you make a \$100 bet. It does mean that, over time, this bet will give the casino a 1.41% cut of the all money made on this bet. This money comes out of your winnings, not out of your losses. In the game of craps, each individual bet has its own vig. Remember,

"The higher the vig, the more you GIVE."

VigRating

The Vig (or House Advantage) is well published for each of the individual bets on the table, but what about a combination of *different* bets as defined in a Betting Strategy? This is the way most people play. The answer is the VigRating. The VigRating plays a very important role in helping you choose the right Betting Strategy before you go to the casino.

DEFINITION: *VigRating*. The VigRating is the advantage that the casino has over the player for an entire Betting Strategy. It is a measure of how fast you can *expect* to lose your money based on the total amount of money bet while playing a certain Betting Strategy.

RECOMMENDATION: Use the VigRating as a secondary factor, to the NET-per-Hour, for objectively comparing Betting Strategies.

Even though the VigRating applies to multiple bet strategies, it should be thought of in the same way as the vig for an individual bet. For example, a VigRating of 5% means that for every \$100 you bet while playing a Betting Strategy, the casino will keep an *average* of \$5.

How do you know what is a reasonable vig and what isn't? The answer is simple. Think of the vig is a kind of <u>tax</u>, and, just like a sales tax, a reasonable VigRating for a strategy would be a value around 5% or less (the lower, the better). You should beware of strategies with VigRatings much higher than this. Remember,

"You can lose BIG if you don't know the vig."

Entertainment Value and "NET-per-Hour"

Also, NET-per-Hour allows you become a "comparison shopper" by giving you the "cost" of different strategies. As a smart shopper, would you go into a department store and buy an item without first knowing the price? If two department stores had the *same identical item* but at two different prices, wouldn't you buy the item with the lowest price? Likewise, a smart player will look at the NET-per-Hour (cost) for each strategy <u>before</u> making a decision whether or not to use that strategy at a casino. Once you know the NET-per-Hour, you can choose a strategy that has a low *expected* cost, and therefore the best Entertainment Value.

Appendix D - Understanding "Maximum" Double Odds

The casino doesn't like certain *free odds* bets because they slow the pace of the game. As the pace slows, so do the casino's profits. The casino offers a solution that is advantageous for both you and the casino "Maximum" Poulte Odds.

	Example		
	Point = 6 o	r 8	
Pass	Double	Payoff	
Bet	Odds	(6 to 5)	
\$5	\$10	\$12	
\$6	\$12	\$14	
\$10 \	\$20	\$24	Double
\$12.5	\$25	\$30	 Odds
L\$15	_\$30_/	_838_	Bet
520	لففقا	\$48	2041
\$25	\$50	_ \$60	
\$30	\$60	\$72	Max.
535 \	\$70	\$84	 Double
\$37.5	\$75	\$90	Odds
\$40	\$80	\$96	0.000
\$45	\$90	\$108	
\$50	\$100	\$120	
\$55 \	\$110	\$132	
\$60	\$120	\$144	
\$62.5	\$125	\$150	
\$65	\$130	\$156	
\$70	\$140	\$168	
\$75	\$150	\$180	
\$80	\$160	\$192	
\$85	\$170	\$204	
\$87.5	\$175	\$210	
\$90	\$180	\$216	
\$95	\$190	\$228	
\$100	\$200	\$240	
\$105	\$210	\$252	
\$110	\$220	\$264	
\$112.5	\$225	\$270	
\$115	\$230	\$276	
\$120	\$240	\$288	
\$125	\$250	\$300	

To illustrate, let's look at a \$15 Pass Line bet with \$30 double odds in the table at left. The payoff for this bet is \$36 which means the dealer must give you a \$25 chip, two 5\$ chips, and a \$1 chip. Using multiple chips colors is undesirable to the casino as it slows the pace of the game, and most don't like payoffs that include \$1 chips. As a result, they often bend the rules a bit by allowing you to increase your *free odds* bet to make the payoff jump to the next level (\$48) in order to make the payoff more convenient.

However, a \$48 payoff still uses \$1 chips (and it still requires three chip colors). The next level above a \$48 payoff is \$60, which is what the casino is looking for -- an even payoff. As a result, the casino will allow you to take \$50 double odds instead of \$30 double odds with your \$15 Pass Line Bet.

This method of making your double odds bet higher than the "standard" double odds amount is called making a <u>maximum double odds</u> bet.

It's important to understand that there are no hard or fast rules that EVERY casino follows. For a specific bet amount and Point number you need only ask the dealer what the "maximum" double odds bet is. Individual casinos tend to be consistent from day-to-day about "maximum" double odds amounts. Therefore, once you find a casino that allows you to increase your double odds bet in this manner, you will not have to ask again the next time you visit that casino.

Notice that a casino that allows a \$10 double odds bet to be increased to \$25 will likewise allow a \$100 double odds bet to be increased to \$250 (the only difference being a factor of 10). Although one casino might allow a \$60 double odds bet to be increased to \$125, another might allow the same bet to be increased to \$200. This depends on the casino you are visiting, and all you have to do is ask.

If you are a green chip player (making \$25 bets on the Pass Line), when the Point is "6", you would take "standard" double odds of \$50 for a payoff of \$60. With "maximum" double odds, you can achieve the same double odds payoff of \$60 using a lower bet of \$15 on the Pass Line. This move lowers your vig from 0.61% to 0.44% and equates to a savings of \$280 over 1980 dice rolls! Not a bad move.

If you are a Don't better, you can use the <u>same</u> tables used for the Pass bet. For example, a \$15 Don't Pass bet can lay maximum double free odds of \$60 to win \$50. Or, a \$50 Don't Pass bet can lay maximum double free odds of \$150 to win \$125, and so on.

Increasing your double odds bet in certain situations is good for both you and the casino. Don't be shy to ask the Dealer in situations where you think they might give you "maximum" double odds -- after all, they want you to make this move more than you. It casino keeps the game at a fast pace and you get a higher double odds bet and a lower vig. However, make sure you have a large enough bankroll to play these higher odds bets. You can use StrategyMaster to find out if you can afford to play this way or not.

To make maximum double odds bets using StrategyMaster, select the "custom" option in the "Free Odds" window. Then, manually type in any double odds amount you want. Note that the Point numbers 4 and 10 NEVER have "maximum" double odds. This is because the payoff is **2 to 1** (or **1 to 2**) and the "maximum" situation of three chip colors or \$1 chips does not apply. Use the tables that follow only as a guide to help you understand the concept of <u>maximum double odds</u> and where it might be allowed.

Maximum Double Odds, Point = 6 or 8

\$15	\$30	\$36
\$20	\$40	\$48
\$25	\$50	\$60

In this example, if you are making a \$15 Pass Line bet, you can take \$50 Double Odds rather than the usual \$30 Double Odds for a payoff of \$60. If you are making a \$25 Pass Line bet, you could REDUCE your bet to \$15 and make the same \$50 free odds bet but at a LOWER RISK.

The first table below shows Standard Double Odds bets for all casinos. Different casinos may have different Maximum Double Odds amounts for any given Pass Line bet, as illustrated in the tables for Casino "A" and Casino "B". These are example values only and do not represent any specific casino.

Pass Line			Pass Line				Pass Line		
"Standard" Double Odds			"Maximum" Double Odds			"Maximum" Double Odds			
(All Casinos)				(Casino "/	A")	(Casino "B")			
	Point = 6 o	er 8		Point = 6 o	r 8	E State	Point = 6 o	r 8	
Pass	Double	Payoff	Pass	Double	Payoff	Pass	Double	Payoff	
Bet	Odds	(6 to 5)	Bet	Odds	(6 to 5)	Bet	Odds	(6 to 5)	
\$5	\$10	\$12	\$5,	\$10	\$12	\$5 ,	\$10	\$12	
\$6	\$12	\$14	\$6	\$12	\$14	\$6	\$12	\$14	
\$10	\$20	\$24	\$10	\$20	\$24	\$10	\$20	\$24	
\$12.5	\$25	\$30	\$12.5	\$25	\$30	\$12.5	\$25	\$30	
\$15	\$30	\$36	\$15 l	\$30	\$36	\$15 L	\$30	\$36	
\$20	\$40	\$48	\$20	\$40	\$48	\$20	\$40	\$48	
\$25	\$50	\$60	\$25	\$50	\$60	\$25	\$50	\$60	
\$30	\$60	\$72	\$30	\$60	\$72	\$30	\$60	\$72	
\$35	\$70	\$84	\$35	\$70	\$84	\$35	\$70	\$84	
\$37.5	\$75	\$90	\$37.5	\$75	\$90	\$37.5	\$75	\$90	
\$40	\$80	\$96	\$40	\$80	\$96	\$40	\$80	\$96	
\$45	\$90	\$108	\$45	\$90	\$108	\$45	\$90	\$108	
\$50	\$100	\$120	\$50	\$100	\$120	\$50	\$100	\$120	
\$55	\$110	\$132	\$55	\$110	\$132	\$55\ L	\$110	\$132	
\$60	\$120	\$144	\$60	\$120	\$144	\$60	\$120	\$144	
\$62.5	\$125	\$150	\$62.5	\$125	\$150	\$62.5	\$125	\$150	
\$65	\$130	\$156	\$65	\$130	\$156	\$65	\$130	\$156	
\$70	\$140	\$168	\$70	\$140	\$168	\$70	\$140	\$168	
\$75	\$150	\$180	\$75	\$150	\$180	\$75	\$150	\$180	
\$80	\$160	\$192	\$80	\$160	\$192	\$80	\$160	\$192	
\$85	\$170	\$204	\$85	\$170	\$204	\$85	\$170	\$204	
\$87.5	\$175	\$210	\$87.5	\$175	\$210	\$87.5	\$175	\$210	
\$90	\$180	\$216	\$90	\$180	\$216	\$90	\$180	\$216	
\$95	\$190	\$228	\$95	\$190	\$228	\$95	\$190	\$228	
\$100	\$200	\$240	\$100	\$200	\$240	\$100	\$200	\$240	
\$105	\$210	\$252	\$105	\$210	\$252	\$105	\$210	\$252	
\$110	\$220	\$264	\$110	\$220	\$264	\$110	\$220	\$264	
\$112.5	\$225	\$270	\$112.5	\$225	\$270	\$112.5	\$225	\$270	
\$115	\$230	\$276	\$115	\$230	\$276	\$115	\$230	\$276	
\$120	\$240	\$288	\$120	\$240	\$288	\$120	\$240	\$288	
\$125	\$250	\$300	\$125 ,	\$250	\$300	\$125 ,	\$250	\$300	
			-			_			

Maximum Double Odds, Point = 5 or 9

"Stand	fard" Doub	le Odds	"Maxin	"Maximum" Double Odds			
(A	II Casinos)		1	(Casino "A")			
1.	Point = 5 or	9		Point = 5 or 9			
Pass	Double	Payoff	Pass	Double	Payoff		
Bet	Odds	(3 to 2)	Bet	Odds	(3 to 2)		
\$5	\$10	\$15	\$5 ,	\$10	\$15		
\$6	\$12	\$18	\$6	\$12	\$18		
\$10	\$20	\$30	\$10 ,	\$20	\$30		
\$15	\$30	\$45	\$15	\$30	\$45		
\$20	\$40	\$60	\$20	\$40	\$60		
\$25	\$50	\$75	\$25	\$50	\$75		
\$30	\$60	\$90	\$30	\$60	\$90		
\$35	\$70	\$105	\$35	\$70	\$105		
\$40	\$80	\$120	\$40 ,	\$80	\$120		
\$45	\$90	\$135	\$45	\$90	\$135		
\$50	\$100	\$150	\$50	\$100	\$150		
\$55	\$110	\$165	\$55	\$110	\$165		
\$60	\$120	\$180	\$60	\$120	\$180		
\$65	\$130	\$195	\$65	\$130	\$195		
\$70	\$140	\$210	\$70	\$140	\$210		
\$75	\$150	\$225	\$75	\$150	\$225		
\$80	\$160	\$240	\$80	\$160	\$240		
\$85	\$170	\$255	\$85	\$170	\$255		
\$90	\$180	\$270	\$90	\$180	\$270		
\$95	\$190	\$285	\$95	\$190	\$285		
\$100	\$200	\$300	\$100 ,	\$200	\$300		
\$105	\$210	\$315	\$105	\$210	\$315		
\$110	\$220	\$330	\$110	\$220	\$330		
\$115	\$230	\$345	\$115	\$230	\$345		
\$120	\$240	\$360	\$120	\$240	\$360		
\$125	\$250	\$375	\$125	\$250	\$375		
\$130	\$260	\$390	\$130	\$260	\$390		
\$135	\$270	\$405	\$135	\$270	\$405		
\$140	\$280	\$420	\$140	\$280	\$420		
\$145	\$290	\$435	\$145	\$290	\$435		
\$150	\$300	\$450	\$150	\$300	\$450		
\$155	\$310	\$465	\$155	\$310	\$465		
\$160	\$320	\$480	\$160	\$320	\$480		
\$165	\$330	\$495	\$165	\$330	\$495		
\$170	\$340	\$510	\$170	\$340	\$510		
\$175	\$350	\$525	\$175	\$350	\$525		
\$180	\$360	\$540	\$180	\$360	\$540		
\$185	\$370	\$555	\$185	\$370	\$555		
\$190	\$380	\$570	\$190	\$380	\$570		
\$195	\$390	\$585	\$195	\$390	\$585		
\$200	\$400	\$600	\$200	\$400	\$600		
			-				

Appendix E - Misc. Tables

Dice Combinations
Payoffs for Crap Bets
Vigs for Crap Bets
Free Odds for Pass Line and Come
Free Odds for Don't Pass and Don't Come
Dice Combinations

			1 0001010 0011101110110110
2	1	1/36	(1,1)
3	2	2/36	(1,2) (2,1)
4	3	3/36	(1,3) (3,1) (2,2)
5	4	4/36	(1,4) (4,1) (2,3) (3,2)
6	5	5/36	(1,5) (5,1) (2,4) (4,2) (3,3)
7	6	6/36	(1,6) (6,1) (2,4) (4,2) (3,4) (4,3)
8	5	5/36	(2,6) (6,2) (3,5) (5,3) (4,4)
9	4	4/36	(3,6) (6,3) (4,5) (5,4)
10	3	3/36	(4,6) (6,4) (5,5)
11	2	2/36	(5,6) (6,5)
12	1	1/36	(6,6)

Dice Table showing the 36 possible outcomes when rolling two dice. For example, the number 7 can be rolled 6 ways using two dice (1 + 6, 2 + 5, 3 + 4, 4+3, 5 + 2, and 6 + 1). Therefore, the odds of rolling a 7 are "6 in 36" or 6/36.

Payoffs for Crap Bets

		00010 0	00010 0000		mprored order		119 111100 0000		
Bet	True odds	Payoff	Vig	Payoff	Vig	Single	Double	Triple	
Pass Line		1 to 1	1.414%			0.85%	0.61%	0.47%	
Don't Pass		1 to 1	1.402%			0.69%	0.46%	0.34%	
Both Pass and Don't Pass		1 to 1	1.409%						
(free odds on Don't Pass)						0.93%	0.70%	0.56%	
Come		1 io 1	1.414%			0.85%	0.61%	0.47%	
Don't Come		1 10 1	1,402%			0.69%	0.46%	0.34%	
Both Come and Don't Come		1 to 1	1.409%						
(free odds on Don't Pass)						0.93%	0.70%	0.56%	
Place 4,10	2 to 1	8 to 5	6.66%						
Place 5,9	3 to 2	7 to 5	4.00%						
Place 6,8	6 to 5	7 to 6	1.52%						
Buy 4,10	2 to 1	2 to 1 (+ 5%)	4.76%						
Buy 5,9	3 to 2	3 to 2 (+ 5%)	4.76%						
Buy 6,8	6 to 5	6 to 5 (+ 5%)	4.78%						
Lay 4,10	1 to 2	1 to 2 (+ 5%)	2.44%						
Lay 5.9	2 to 3	2 to 3 (+ 5%)	3.23%						
Lay 6,8	5 to 6	5 to 6 (+ 5%)	4.00%						
Any 2,12 **	35 to 1	29 lo 1	16.67%	30 to 1	13.89%				
Any 3,11	17 to 1	14 to 1	16.67%	15 to 1	11.11%				
Any 7	5 to 1	4 to 1	16.67%						
Any-Craps	8 to 1	7 to 1	11.11%						
Hardway 4,10	8 to 1	7 to 1	11.11%						
Hardway 6, 8	10 to 1	9 to 1	9.09%						
Field (2D,12D)			5.55%						
(2 Pays Double, 12 Pays Triple)									
Field (2D,12T)			2.77%						
(2 Pays Double, 12 Pays Double)									
Big 6, 8	6 to 5	1 to 1	9.09%						

**A few casinos pay 31 to 1 (Vig=11.11%)

Vigs for Crap Bets

The following table shows vigs (house advantage) for all of the bets on the table, in order from lowest to highest vig.

Don't Pass w/triple odds	0.34%
Don't Pass w/double odds	0.46%
Pass w/triple odds	0.47%
Both Pass & Don't Pass	0.56%
(triple odds on Don't Pass bet)
Pass w/double odds	0.61%
Don't Pass w/single odds	0.69%
Both Pass & Don't Pass	0.70%
(double odds on Don't Pass bet)
Pass w/single-odds	0.85%
Both Pass & Don't Pass	0.93%
(single odds on Don't Pass bet)
Don't Pass	1.40%
Don't Come	1.40%
Pass	1.41%
Come	1.41%
Place 6,8	1.52%
Lay 4,10	2.44%
Field (2 Pays Double, 12 Pays Triple)	2.77%
Lay 5,9	3.23%
Place 5,9	4.00%
Lay 6,8	4.00%
Buy 4,10	4.76%
Buy 5,9	4.76%
Buy 6,8	4.76%
Field (2 Pays Double, 12 Pays Double)	5.55%
Place 4,10	6.66%
Hardway 6, 8	9.09%
Big 6, 8	9.09%
Any Craps	11.11%
Hardway 4,10	11.11%
Any 2,12	16.67%
Any 3,11	16.67%
Any 7	16.67%

Free Odds for Pass Line and Come

	Point = 6	or 8	Point = 5	ior 9	Point = 4	or 10
Pass	Free Odds	Payoff	Free Odds	Payoff	Free Odds	Payoff
Bet	Bet	6 to 5	Bet	3 to 2	Bet	2 to 1
\$5	\$5	\$6	\$6	\$9	\$5	\$10
\$10	\$10	\$12	\$10	\$15	\$10	\$20
\$15	\$15	\$18	\$16	\$24	\$15	\$30
\$20	\$20	\$24	\$20	\$30	\$20	\$40
\$25	\$25	\$30	\$26	\$39	\$25	\$50
\$30	\$30	\$36	\$30	\$45	\$30	\$60
\$40	\$40	\$48	\$40	\$60	\$40	\$80
\$50	\$50	\$60	\$50	\$75	\$50	\$100
\$60	\$60	\$72	\$60	\$90	\$60	\$120
\$70	\$70	\$84	\$70	\$105	\$70	\$140
\$75	\$75	\$90	\$76	\$114	\$75	\$150
\$100	\$100	\$120	\$100	\$150	\$100	\$200

			DOUBLE	ODDS		
	Point = 6	or 8	Point = 5	ior 9	Point = 4	or 10
Pass	Free Odds	Payoff	Free Odds	Payoff	Free Odds	Payoff
Bet	Bet	6 to 5	Bet	3 to 2	Bet	2 to 1
\$5	\$10	\$12	\$10	\$15	\$10	\$20
\$10	\$20	\$24	\$20	\$30	\$20	\$40
\$15	\$30	\$36	\$30	\$45	\$30	\$60
\$20	\$40	\$48	\$40	\$60	\$40	\$80
\$25	\$50	\$60	\$50	\$75	\$50	\$100
\$30	\$60	\$72	\$60	\$90	\$60	\$120
\$40	\$80	\$96	\$80	\$120	\$80	\$160
\$50	\$100	\$120	\$100	\$150	\$100	\$200
\$60	\$120	\$144	\$120	\$180	\$120	\$240
\$70	\$140	\$168	\$140	\$210	\$140	\$280
\$75	\$150	\$180	\$150	\$225	\$150	\$300
\$100	\$200	\$240	\$200	\$300	\$200	\$400

TRIPLE ODDS								
	Point = 6	or 8	Point = 5	ior 9	Point = 4 or 10			
Pass	Free Odds	Payoff	Free Odds	Payoff	Free Odds	Payoff		
Bet	Bet	6 to 5	Bet	3 to 2	Bet	2 to 1		
\$5	\$15	\$18	\$16	\$24	\$15	\$30		
\$10	\$30	\$36	\$30	\$45	\$30	\$60		
\$15	\$45	\$54	\$44	\$66	\$45	\$90		
\$20	\$60	\$72	\$60	\$90	\$60	\$120		
\$25	\$75	\$90	\$76	\$114	\$75	\$150		
\$30	\$90	\$108	\$90	\$135	\$90	\$180		
\$40	\$120	\$144	\$120	\$180	\$120	\$240		
\$50	\$150	\$180	\$150	\$225	\$150	\$300		
\$60	\$180	\$216	\$180	\$270	\$180	\$360		
\$70	\$210	\$252	\$210	\$315	\$210	\$420		
\$75	\$225	\$270	\$224	\$336	\$225	\$450		
\$100	\$300	\$360	\$300	\$450	\$300	\$600		

Free Odds for Don't Pass and Don't Come

	Point =	6 or 8	Point =	5 or 9	Point = 4 or 10		
Don't							
Pass	Free Odds	Payoff	Free Odds	Payoff	Free Odds	Payoff	
Bet	Bet	5 to 6	Bet	2 to 3	Bet	1 to 2	
\$5	\$6	\$5	\$9	\$6	\$10	\$5	
\$10	\$12	\$10	\$15	\$10	\$20	\$10	
\$15	\$18	\$15	\$24	\$16	\$30	\$15	
\$20	\$24	\$20	\$30	\$20	\$40	\$20	
\$25	\$30	\$25	\$39	\$26	\$50	\$25	
\$30	\$36	\$30	\$45	\$30	\$60	\$30	
\$40	\$48	\$40	\$60	\$40	\$80	\$40	
\$50	\$60	\$50	\$75	\$50	\$100	\$50	
\$60	\$72	\$60	\$90	\$60	\$120	\$60	
\$70	\$84	\$70	\$105	\$70	\$140	\$70	
\$75	\$90	\$75	\$114	\$76	\$150	\$75	
\$100	\$120	\$100	\$150	\$100	\$200	\$100	

			DOUBLE	ODDS		
	Point =	6 or 8	Point =	5 or 9	Point = 4	t or 10
Don't						
Pass	Free Odds	Payoff	Free Odds	Payoff	Free Odds	Payoff
Bet	Bet	5 to 6	Bet	2 to 3	Bet	1 to 2
\$5	\$12	\$10	\$15	\$10	\$20	\$10
\$10	\$24	\$20	\$30	\$20	\$40	\$20
\$15	\$36	\$30	\$45	\$30	\$60	\$30
\$20	\$48	\$40	\$60	\$40	\$80	\$40
\$25	\$60	\$50	\$78	\$52	\$100	\$50
\$30	\$72	\$60	\$90	\$60	\$120	\$60
\$40	\$96	\$80	\$120	\$80	\$160	\$80
\$50	\$120	\$100	\$150	\$100	\$200	\$100
\$60	\$144	\$120	\$180	\$120	\$240	\$120
\$70	\$168	\$140	\$210	\$140	\$280	\$140
\$75	\$180	\$150	\$225	\$150	\$300	\$150
\$100	\$240	\$200	\$300	\$200	\$400	\$200

			TRIPLE	ODDS		
	Point =	6 or 8	Point =	5 or 9	Point = 4	or 10
Don't						
Pass	Free Odds	Payoff	Free Odds	Payoff	Free Odds	Payoff
Bet	Bet	5 to 6	Bet	2 to 3	Bet	1 to 2
\$5	\$18	\$15	\$24	\$16	\$30	\$15
\$10	\$36	\$30	\$45	\$30	\$60	\$30
\$15	\$54	\$45	\$69	\$46	\$90	\$45
\$20	\$72	\$60	\$90	\$60	\$120	\$60
\$25	\$90	\$75	\$114	\$76	\$150	\$75
\$30	\$108	\$90	\$135	\$90	\$180	\$90
\$40	\$144	\$120	\$180	\$120	\$240	\$120
\$50	\$180	\$150	\$225	\$150	\$300	\$150
\$60	\$216	\$180	\$270	\$180	\$360	\$180
\$70	\$252	\$210	\$315	\$210	\$420	\$210
\$75	\$270	\$225	\$339	\$226	\$450	\$225
\$100	\$360	\$300	\$450	\$300	\$600	\$300