

Main Menu: BJRM 2002

The Main Menu screen of BJRM 2002 gives you two options for accessing the various parts of the program. You can either click on one of the prominently displayed "buttons," or you can select a choice from the drop-down Menus in the top left corner of the screen. BJRM 2002 features/sections include:

The One Second Simulator: Select from hundreds of pre-run simulations. Manipulate bet patterns. Find your optimum bet placement within a spread. Calculate Win Rate, ROR, DI, SCORE, N0 (N-Zero) and mostly all of the important blackjack statistics.

Trip-based Statistics: Determine your Trip (or Session) Risk-of-Ruin, expectation, and the odds of reaching certain goals and milestones. Graphically view typical "ups and downs" of your bankroll, hour-by-hour and trip-by-trip, in the "**Take A Random Walk**" section.

Risk of Ruin Calcs: Basic "lifetime" Risk-of-Ruin statistics, based on given Win Rates, SDs and Banks. Also, solve for required \$ Bank, given a target Risk-of-Ruin value. View number of hands and hours required for +1, +2, and +3 SD results.

Systems 101: Several learning tools. A basic entry-level "course" in several popular counting systems. Learn the card tags, I18 and F4 indices, and where to go for more information. Learn simple Basic Strategy. Practice Card Counting. Get an estimate of how many hands per hour you will play.

Build One Sec Sim Files: Primarily for "Advanced" Users, this feature assists you in creating your own custom input files for use in the One Second Simulator. The data can be entered in two ways: (1) manually, based on output from simulations you have run with certain commercially available simulator programs, or (2) automatically parsed from the standard output report files of Karel Janecek's Statistical Blackjack Analyzer program (purchased separately). If you find the pre-run simulations in the One Sec Simulator sufficient, and many of you will, you can just ignore this program feature.

About: (found under the Help Menu): A brief "About This Program" screen. Identifies the release version of BJRM, and includes my acknowledgment and thanks to BJRM feature contributors, without whom BJRM would not have been possible.

Help: Access to the detailed on-line Help system for BJRM. Can be selectively printed out to serve as a User Guide..

Blackjack Risk Manager 2002 Basic Information

Blackjack Risk Manager 2002 (BJRM) is a easy-to-use “utility” program that automatically and instantly performs several complicated blackjack risk-related statistical calculations, providing you with the facts you need to manage your total blackjack risk. BJRM can be used to provide answers to many very important blackjack questions, such as:

- What is the **Risk-of-Ruin** of my trip/session, based on my trip and/or total playing bank?
- **Which is the “better” game to play**, an H17 DAS 2 deck 70 card penetration game, played “all” with a 1-6 spread, or a back-counted S17 DAS LS 1-8 spread game where 4.5 decks of 6 are dealt?
- What is my **probability of being ahead** by, say, \$2000, sometime during my next 16 hours of play?
- Exactly **how much bank do I need** if I am willing to tolerate a 10% risk-of-ruin? What if I change that to 5%?
- Within my spread, how much, and where, should I place bets in order to **maximize the rate of my bankroll growth**?
- What is the “**\$\$ hourly win rate**” that a specified game will yield?
- How would things change if I got in **more “hands per hour”**?
- What if I played **two hands per round**, instead of one?
- Is it “worth it” to **learn a new**, more powerful but more complicated counting **system**?
- I played 6 hours last weekend, and lost \$5,000. **How rare of an event** was that?
- I seem to experience very **wild \$ “swings”** as my blackjack play mounts up. **Is that normal**?
- I do a lot of table-hopping. How many hands per hour am I actually playing?
- And many, many more questions — just as interesting and revealing.

Most questions can be answered with very little text entry, simply by selecting and mouse-clicking on the program’s built-in choices. To perform many of the custom calculations, Blackjack Risk Manager needs only two values: Win Rate and Standard Deviation (SD). These values are readily available from several sources, including those published in popular **blackjack literature**; values obtained from **simulations** run on most of the blackjack simulator programs on the market; but, perhaps most importantly of all, from **within BJRM 2002** itself!

A program feature I have dubbed the “**One Second Simulator**” (OSS) has, built-in, the statistical results of hundreds of already completed simulations, covering a wide range of blackjack rule and penetration combinations. Utilizing these simulations as a base, the OSS feature allows you to select a particular counting system (e.g. hi-lo, K-O, UBZII, AO2/A, Zen, Halves, RPC, etc.), the number of decks in play, a particular rules set, and a penetration level.

Then, for betting, you can: enter your own preferred pattern; select from a number of one-click choices; or, perhaps best of all, you can utilize what is likely OSS’s most valuable feature — its ability, when given a specific bet spread, to automatically compute the best size and placement of those bets in order to optimize the growth rate of your bankroll! And it does this for both “play-all” and “wonging,” including determination of the optimum wong-in point (it is not always the first positive EV true or running count!)

For all you fans of Don Schlesinger’s writings, one of the one-click bet patterns in OSS features a hi-lo player using the “Illustrious 18” and “Fab 4” strategy departures, and utilizes the actual results from the 400,000,000 round simulations I generated as the basis for Chapter 10 of Don’s classic book, *Blackjack Attack: Playing the Pros’ Way*. [Note: If you are not familiar with Don’s book, you should be! You will find BJRM to be an excellent complement to *Blackjack Attack*, and vice versa]. OSS even goes beyond Chapter 10 of the First Edition, to include a complete set of data for 8-deck games!

New to this latest version of Blackjack Risk Manager are two features that I hope you will find useful and fun. First, I have created a program feature I call “Systems 101” to get you started with basic information about several of the more popular card counting systems in use today. It is a sort of introductory “course” on the raw basics of several card-counting systems, and includes a description of their card tags, their I18 and Fab4 indices, and recommendations as to books and Web sites you can consult for in-depth information.

Second, because I believe that many card counters do not really have a firm grasp on the nature of the bankroll swings they experience because of the inexorable workings of the effects of standard deviation, I have created a program screen that graphically displays typical examples of the hour-by-hour and trip-by-trip fluctuations you may very well experience. I call this part of BJRM “Take a Random Walk,” in reference to the common metaphor that the bankroll growth of a card counter is like taking “a random walk,” which in the short- and medium-run, can sometimes lead all

over the place, but, fortunately, trends upward as the long-run is approached. I think you'll find this feature to be a real eye-opener.

I'd like to note that I have tried very hard to write Blackjack Risk Manager in such a way as to make a traditional, hard-copy User Guide unnecessary. In addition to this Help File, BJRM has automatic real-time "help," in that, as the mouse cursor is placed over the text and data on the screen, a small pop-up mini-window displays the descriptions and/or instructions you need to put the program through its paces.

So dig in, explore, and enjoy — Blackjack Risk Manager 2002. And may you never be surprised by the "ups and downs" of blackjack risk, again!

- John M. Auston

The One Second Simulator

Of all the features in BJRM, the One Second Simulator (OSS) may be the most useful. As a consequence of its power, it is a little harder to set up and use than the other screens, but if you pay careful attention to the information in this section of the Help file, you should not have any problem.

Basically, the OSS functions by reading in data from previously run flat-bet simulations. Based on those data, it then lets you input various bet amounts, patterns, and styles of play, to observe the effect they will have on your bankroll and risk-of-ruin. In a very powerful and useful feature, it will even automatically compute the bet pattern, within a certain given bet spread, that will maximize the growth rate of your bankroll! The pre-run sims of OSS can come from 3 sources: (1) built-in (full hi-lo, selected game conditions for KO, Zen, Red7, and UBZII); (2) expanded KO, Zen, Red7, and UBZII, and several other systems, available if you are an owner of Karel Janacek's SBA program; (3) separately purchased sim sets. **Note:** if BJRM failed to detect that you own SBA, you can click the "?" button in the Sim Source box and enter your SBA serial number. This will "unlock" the extra sim sets.

Now, the best way to understand what all this means is to jump right into using it. So here is how to get started using the One Second Simulator. Note that when you first enter the OSS, it may already be displaying the results of the last time you ran it. If that is so, you either leave it there, or do the following:

Getting Started:

Step 1:

Select a Sim Source, then, from the drop down lists, select: a Counting **System**, # of **Decks** in play, **Rules** Set, and **Penetration** level.

Step 2:

Enter or verify your BJ Bank, in \$\$, and the \$\$ size of your playing Unit, which is automatically determined by BJRM based on the number of Units you divide the Bank into (e.g., 400 units of a \$10,000 Bank yields a \$25 Unit).

Step 3:

Click on the "**Load**" button to load-in the simulation data for the conditions you have chosen.

Step 4:

Next, click the "**Calc**" button to have the OSS instantly compute flat-bet statistics for the game conditions you have selected .

You may have noticed that the "**Load**" and "**Calc**" buttons turn "red" in color, at various times. This "visual clue" is meant to indicate that some important settings in the program have been changed, and that an appropriate button click is needed to load or compute the correct related data. BJRM also uses this "changing to red" in other places throughout the program. In every case, it means that screen settings have been altered, and action is required from you to keep the screen calculations in-sync.

If you have completed Steps 1 through 4 (or have left your previous results alone), the screen should now be displaying several computed statistics, based on the "play all" with flat bet of 1 unit default settings. From this starting point, you can now directly manipulate the bets in several ways.

You can set them manually, of course, either by entering them via your keyboard or selecting from the provided drop-down choices. The **Calc** button will visually clue you when you need to click it.

A quicker way to get started, however, can be found under the [Quick Bet Options](#) heading.

Other One Second Simulator Help Sections:

[Quick Bet Options](#)

[View Two Hand Equivalents](#)

[Miscellaneous OSS Screen Item](#)

[Find Optimum Bet Placement Within Spread](#)

[Adjust Your Dollar Unit Size](#)

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The Quick Bet Options Selections:

To speed up data entry, the OSS offers you a series of pre-defined drop-down choices that automatically populate entire bet patterns for you. Some of these selections will make use of another screen value, labeled "**MaxBet (x)**," which is a field that is used to set the upper limit (maximum bet) of your spread. There is a default value based on # of decks in play, but you can, of course, change this to any number you like.

By way of example, the drop-down selection labeled "**Opt 0 to MaxBet**" would automatically populate optimum (based on the **Bank** unit size) bets, with a minimum bet of **0** (at negative ev counts), and maximum bet off the **MaxBet** value.

Following is an explanation of what the various other drop-down choices will do:

1-1: Flat Bet 1 Unit

1-Opt: Always bet at least 1 Unit, otherwise bet optimum based on **Bank**, no upper limit

Opt: Bet optimum based on **Bank**, no upper limit, and **0** if negative ev

Opt Int: Same as **Opt**, except only integers are used

Opt 1 to MaxBet: Bet optimum based on **Bank**, except always bet at least **1u**, and no more than **MaxBet**.

Opt 0 to MaxBet: Bet optimum based on **Bank**, bet **0** if negative ev, and no more than **MaxBet**.

Opt Int 1 to MaxBet: Same as **Opt 1 to MaxBet**, except only integers are used

Opt Int 0 to MaxBet: Same as **Opt 0 to MaxBet**, except only integers are used

Use BJA Chapt 10 Bets Button

Related to the Quick Bet Options, this button, functional only for the Hi-Lo sims initially supplied with BJRM, will automatically populate a bet pattern that matches one of those used in the simulations that were behind the Chapter 10 charts in Don Schlesinger's classic *Blackjack Attack: Playing the Pros' Way*. This button is provided mainly in order to retain a feature of the original version of BJRM, which allowed you to easily view and compare the individual Chapter 10 results.

Two Hand Equivalents Button

Note: This pop-up screen should not be confused with the "**Play Two Hands Of**" feature described elsewhere in this Help System.

The **Two Hand Equivalents** button causes a pop-up window to appear that gives you a "quick and dirty" idea of the \$ sizes of the bets you would place, on each of two hands, if you wanted to keep your same ROR, but win a bit more money than with "one hand of" bets. If, instead of what this window shows, you simply split your one-hand bet in two, and placed each half as a separate bet for that round, your expectation would be to win the same \$ amount of money, but at a reduced ROR. Note: The previously mentioned "**Play Two Hands of**" option, of the **Find Spread Configuration that Maximizes DI** routine, will give you a better idea of how you should optimally play two hands, instead of one.

Miscellaneous Screen Items:

Print Screen Image Button

Sends an image of the current contents of the screen to your printer.

← Cpy OptB Button

Simply copies the value current displayed in the OptB (u) field, to the Bank (u) field. A re-**Calc** may be required. This button is provided simply as a time saver.

SCORE (per 100 and per Hour) Fields:

SCORE is an acronym, coined by Don Schlesinger, that stands for the phrase “Standardized Comparison Of Risk and Expectation.” Technically, it is simply a game’s Desirability Index (DI), *squared*, but it has, many believe, more immediate practical value than the DI statistic. SCORE represents a given game’s normalized \$ *return on investment*, based on the assumption of a standard \$-sized Bank (\$10,000 is used as a basis for standardized comparisons). What makes this measure appealing is twofold: First, it puts an absolute dollar value on an hour’s worth (and/or 100 hands) of your play. You can tell, immediately and exactly, what your hourly “wages” will be. Second, it relates more realistically the *comparisons* you may wish to establish among different games and conditions.

For example, if two DIs are given as, say, 7.07 and 5.00, you may not really grasp from these numbers, whose ratio is 1.41 (7.07 / 5.00), that the first game is actually worth *twice as much* as the second, on a risk-adjusted basis. But because the SCORE *squares* the DI values and converts them to a dollar amount based on your unit size, you can understand immediately that you will win precisely *double* by choosing the first game over the second.

SCORE is given here in BJRM as both a “per 100” and as an estimated “per Hour” value as a means of adjusting for the differences in speed of various blackjack games, with various numbers of other players at the table. Note that, on the screen, you will find the “SCORE” text replaced by “DI * DI” if you use other than a \$10,000 bank, and/or are not betting optimally. You can put in your own value for “hands per Hour”, and when you click the “Apply” button, the “per Hour” part of the SCORE (or DI * DI) will be adjusted. You can also auto copy the saved “hands per Hour” from BJClock.

Adjst EV Field

The Adjst EV field will probably rarely be set to anything other than its 0 default value. Its purpose is to let you specify, should you desire, a fixed amount that will be added to, or subtracted from, the *ev* data displayed for the individual counts. You might do this to add or subtract for Rules that were not considered in the pre-run sims. Here are some guidelines, based on their effect on the BS player:

Rule	1D	2D	6D	8D
Double Down only on 11	-0.8	-0.7	-0.6	-0.6
Double Down only on 10 or 11	-0.25	-0.2	-0.2	-0.2
Double Down only on 9, 10 or 11	-0.1	-0.1	-0.1	-0.1
No Splitting of Aces Allowed	-0.15	-0.2	-0.2	-0.2
Resplit Aces	0.03	0.05	0.06	0.06
Early Surrender (S17)	0.6	0.6	0.6	0.6
Early Surrender (H17)	0.7	0.7	0.7	0.7
Early Surrender vs Dealer Ace (S17)	0.4	0.4	0.4	0.4
Early Surrender vs Dealer Ace (H17)	0.5	0.5	0.5	0.5
Early Surrender if Dealer shows a Ten	0.2	0.2	0.2	0.2
No Hole Card, Dealer takes only original bet	0	0	0	0
No Hole Card (European Rules) Dlr takes all	-0.1	-0.1	-0.1	-0.1

You also might want to perform this adjustment if you feel that, in order to simulate your real-life casino play, you do not want to use the actual computer simulated *ev*’s. For example, you may play many more (or many less) BS departures than were used in this screen’s base data (the I18 and F4), or perhaps you play a stronger count system. Alternatively, you may want to account for errors you likely make, or perhaps you just want to be “conservative.”

Unfortunately, I cannot offer you any guidelines on what size adjustments to make. But, the feature is there, if you wish to make use of it.

Avg Bet (units and \$): The average bet you will be making. Relevant for “comp” purposes, among other things.

%W/L: The hourly win rate, expressed as a percentage of the initial bets.

SD/Hnd (units and \$): The Standard Deviation per hand played, shown as a number of units and as a dollar amount, based on current Unit \$ size.

SD/100 (units and \$): The Standard Deviation per 100 hands played, or observed, if wonging, shown as a number of units and as a dollar amount, based on current Unit \$ size.

Win/100 (units and \$): The number of units/\$ won (or lost) per 100 hands played, or observed, if wonging, shown as a number of units and as a dollar amount, based on current Unit \$ size.

DI: The Desirability Index. An adjusted ratio of the games Win Rate to the games Standard Deviation. Higher is better. General consensus is that at least a 5.0 is required to make a game reasonably “desirable.”

Hnds to N0 (N-Zero): The number of hands that need to be played before expectation (ev) exceeds a one standard deviation result. A player has, roughly, an 84% chance of being ahead after playing this many hands.

ROR: The classic Risk-of-Ruin of your Bankroll. The probability that you will lose your entire Bank, assuming you never adjust your \$ unit size, regardless of whether you are winning or losing.

Hnds to Dbl: The number of hands that need to be played until the accumulated Win Rate’s expectation is double the starting Bank.

Exp Grwth Rate: The percent rate at which your bankroll will exponentially grow.

Following is an explanation of the items in the **Sim Raw Data, and Bets** screen section:

of Hnds: The number of hands you are placing bets for, per round. Usually one.

tc or irc=: The True Count (tc), for balanced systems, or the Initial Running Count (irc=), for unbalanced systems.

When this says “irc=,” you can click on it with your mouse, and a window will pop-up allowing you to specify an IRC that is different from the one that was used when the base simulation was run. This lets you easily adjust the screen data to fit the IRC you use when you actually play, if it is different from the sim default.

bet u: The bet you will be making, expressed in Units.

Bet \$: The bet you will be making, expressed in dollars, and based on the current Unit (\$).

freq: The frequency of occurrence of the respective true or running count.

ev: Your positive or negative expectation (your or the house’s “edge”) at the given true or running count.

sd: The standard deviation at the given true or running count.

o bet: The optimum bet, expressed in Units, for the given true or running count.

Find Spread Configuration that Maximizes DI

Many find this to be the most interesting and useful feature of the entire Blackjack Risk Manager program. By making use of the speed and tireless repetition ability of the computer, this section automatically computes for you, through “behind-the-scenes” iterative trials, the various bet sizes within your specified spread, and the optimal counts at which to place them, in order to maximize the exponential growth rate of your bankroll \$’s.

This optimal bet pattern happens to be the one that maximizes the DI value (or, equivalently, minimizes the N-Zero value) for the given spread, hence the title of the section.

Here is how to use it:

Step 1:

Be sure you have loaded in the base data for the game you wish to analyze (Steps 1-4, as described at the beginning of the One Second Sim Help text.)

Step 2:

Select either **Wong** or **Play All**. If you select **Wong**, then also set/verify the **BackCount At TC/RC of** field.

Step 3:

Verify that the **MaxBet (x)** field is set at the upper limit of your intended spread.

Step 4:

Make decisions, or not, concerning the several optional settings that can affect how this section performs:

Optional Setting: Change the **MaxBet(x) By TC /RC of** field to a lower count value than the default, which is the maximum count bucket (the \geq one) displayed for the system chosen. This field, in essence, lets you *force* the max bet of your spread *down* to an earlier count than the “maximize bankroll growth” routine would otherwise compute. While this may not result in the optimum growth of your bankroll for this spread, you may have reasons for doing so anyway. You might want to leave this field at its default setting, to first let the routine show you where it would recommend that Max Bet be placed. You can always force it down at any time, and run the routine again.

Optional Setting: Change the **Kelly (%)** field to a setting other than Full. Choices are $\frac{1}{2}$, $\frac{1}{3}$, and $\frac{1}{4}$ Kelly. You can think of these settings as instructing BJRM to “pretend” that you have less Bank than you actually do. All calculations will proceed normally, except with this lower Bank assumption. The primary effect is on Risk-of-Ruin, which is proportionately lower — the lower, the smaller the Kelly fraction.

Optional Setting: Select the **Use Integer Bets option** to have BJRM round “# of units” bet to integers. Combined with a forced Bank size that creates integer Unit \$ sizes, this will result in more “real world” \$ bet amounts (chip denominations) at the various TC/RC points.

Optional Setting: Select the **2x Jumps Max** option to force the Optimum Bet Size and Placement routine to include a restriction that no recommended bet for a given TC/RC can be more than twice the recommended bet of the previous TC/RC. Thus, you have increased your chances for making a natural looking parlay (at a small cost to your SCORE) but only when the true/running count increases by 1 from one round to the next.

It is very important that you fully understand that last statement. This **2x Jumps Max** setting only affects the routine that computes what your optimum bets should be, and when they should be placed. When you then apply these bets to the pre-run sim data, it is *as if* you did a parlay ONLY when the TC (or RC) at the beginning of a round was one more than the previous round. For example, the previous round was TC +2, and now it is +3. Your bet will be, at most, twice the previous bet, because TC +3 is the next increment up from +2, and the **2x Jumps Max** setting has guaranteed that the +3 bet is not more than twice the +2 bet. If the current round were a +4, though, then the bet recommended for a +4 was used, even though it may very well be more than twice the previous round’s +2.

So, this setting helps increase the number of parlays you are able to do (or, perhaps said better, it avoids recommending a non-parlay bet jump between two consecutive TCs or RCs), but it does NOT restrict you to the situation of ALWAYS only betting, at most, twice what you bet the previous round.

Optional Setting: Select the **Play “Two Hands of”** field to convert the normal “one hand of” functioning of BJRM, based as it is on its canned “one hand of” simulations, into a reasonably accurate representation of what results would obtain if you *always* played two spots, instead of one.

When you select this option, a “window” will pop-up, allowing you to accept the default correlation coefficient of 0.37, or to change it to 0.36, 0.38, or 0.39. In addition, you are shown this important explanatory Note: “*When using this “Play Two hands of” option, the \$ and Unit Bet values on the screen represent what you should bet on EACH of the INDIVIDUAL HANDS, while all the other statistics represent the TOTAL ACTION of the two bets together.*” After clicking the **Close** button, you will be returned to the One Sec Sim, where, depending on what you were doing before selecting this option, you may need to perform a re-**Calc** of the screen data. The relevant screen button will turn red, if this is the case.

Optional Setting: Select the **Find Best Wong-In** option (valid only when you are wonging, of course) to have BJRM automatically determine the optimum TC/RC for you to wong-in at. This is usually, but not always, the first positive EV TC/RC, and is particularly sensitive to the bet spread you have selected. The only visual sign you will see on the screen is the automatic setting of the **BackCount at TC/RC of:** value.

Step 5:

Click the **Calc Optimum Bets** button, which should now be “red” in color.

Depending on the particular game conditions and BJRM options you have specified, in typically less than one second, the computer will analyze and find your optimized **Bet** amounts, their appropriate TC/RC placement, and the specific value of the number of Bank “units” (and thus Unit \$ size) that resulted in a maximized DI for the spread you selected. If you are playing at Full Kelly, this will yield an ROR of around 13.5%, which is an optimum value for maximizing exponential bankroll growth, though perhaps not one you want to “live” with.

At this point, if you want to “normalize” the \$ Unit size that was computed by the “maximize DI” routine, you can click on the **Adjust Unit \$** button to access a pop-up screen that will allow you to change either the total \$ Bank or the # of units the bank is divided up into, in order to get a desired \$ Unit size. Refer to the section of this Help File that describes the **Adjust Unit \$** button, for more information.

To adjust Risk-Of-Ruin lower, you can go to the lifetime [Risk-Of-Ruin Calcs](#) screen, and copy in the values from the One Second Simulator.

Go To Other One Second Sim Help Sections:

[View Two Hand Equivalents](#)

[Miscellaneous Screen Items](#)

[Find Optimum Bet Placement Within Spread](#)

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Adjust Unit \$ Size To Nearest Integer Chip Denomination

This screen allows you to play around with combinations of **Total \$ Bank** and **Total # of Units** in order to create a desired integer **\$ Unit** size.

Along the top of the screen, you can see the current One Sec Sim Screen values for **Total \$ Bank**, **Total # of Units**, and **\$ Unit Size**.

In the **Force Which to Change?** section, you specify that either **Total \$ Bank** or **Total # of Units** should change, so that when the former is divided by the latter, a **\$ Unit** that is an integer will result. Further, that Integer will be set to the nearest value that represents a multiple of a specified Chip denomination (\$5, \$25, \$100, or \$500), based on the current setting of the **To Nearest Chip Multiple** box.

Note: If you specify that **Total \$ Bank** should change, then the Risk-of-Ruin will remain constant. If you specify that **Total # of Units** should change, then the Risk-of-Ruin will also change.

The **Adjusted Values** section of the screen will now show you the new values for **Total \$ Bank**, **Total # of Units**, and **\$ Unit Size**. The **Up 1** and the **Down 1** buttons will let you make further adjustments. The "1" here refers to "one Chip Multiple," as currently selected in the **To Nearest Chip Multiple** box.

Once you have finished adjusting the screen values, you then have two exit options. If you click on the **Use These Values & Exit** button, the Adjusted Values will be copied back to the One Sec Sim, and you will be returned there. All of the One Sec Sim \$-based statistics will have been automatically updated, based on your selected new values.

If you instead click on the **Just Exit, No Changes** button, you will be returned to the One Sec Sim, and no values will have been changed.

Trip Calculations

On this screen, you start by entering, or copying in from the One Second Simulator, the **“Win per 100 hnds”** and the **“SD per 100 hnds”** values for the play style and game you are analyzing. Then, from drop-down lists or your own entry, you specify: **Trip \$ Unit**, (use \$1 if you wish to work in “units”); Your **\$\$ Trip Bank** — the amount of money you are bringing with you on the “trip”; the number of hours you intend to play (Trip Hours); the **“Hands per Hour”** you expect to experience; and finally, if you like, a **“Trip Goal”** — an amount of \$\$ for which you would like to see the probability of reaching at some point in your trip, and subject to the possibility of your running out of your trip stake.

Now, you need only mouse-click on the **“Calculate”** button to instantly generate all of the Trip-related statistics. Change the settings and click again, as often as you like. At any point, you can print an image of the screen data by clicking on the **“Print Screen Image”** button.

An additional screen feature, **Post-Trip Result Analysis**, allows you to type in an actual **Trip Result**, in \$\$\$. When you click on the associated **Calc** button, you will see the plus or minus **Standard Deviation** value that the entered trip result represents. Additionally, the screen text will translate that SD number into a probability value (%) that will tell you how likely the event was.

Finally this Trip Risk of Ruin screen gives you access (click button or select from Menu) to what I hope you will find to be a very eye-opening feature, the [Take A Random Walk](#). For the type of games and conditions you play, the Random Walk screen graphically depicts statistically accurate representations of the hour-by-hour and trip-by-trip results that you are likely to experience. Specifically, it is based on the parameters you currently have loaded onto the Trip Risk of Ruin screen. Should you change those items, they will be automatically accounted for in your next Random Walk.

I trust that you will find that this BJRM feature really drives home a sense for the effect standard deviation can have on your blackjack “fortunes.”

Statistics Displayed on the Trip Risk of Ruin Screen:

Bankroll Risks section

Complete Trip RUIN:

This is your percentage chance of completely running out of the Trip Bank you brought, at some time during the total Trip Hours.

Odds of Hitting Trip GOAL:

There are three statistics in this grouping.

The first shows your probability of hitting your Trip GOAL, at some point within the Trip Hours, and subject to the possibility of running completely out of Trip Bank before doing so. This is a very tricky “double barrier”-type calculation that is very difficult to compute by hand.

The second GOAL statistic shows your probability of hitting your Trip GOAL, at some point within the Trip Hours, but NOT subject to the possibility of running completely out of Trip Bank before doing so, because it assumes that you can replenish your trip bank if you happen to run out.

And the third stat shows the probability of reaching your Trip Goal, subject to the constraints of your Trip Bank (you could “tap out”), but with no limit on time – the Trip Hours limit is NOT factored in. Thus, this last figure is just the probability of reaching a goal, given a fixed, limited Bank.

Trip \$\$ Expectations section

Trip \$ Win Expectation is based on assuming both the Trip Bank only, and an “infinite” Trip Bank - you replenish as necessary.

Hourly Win Rate: If blackjack is/were your "job," think of this as your gross hourly pay rate.

Trip Probabilities — no Bank limit: The statistics in this group are all based solely on the Inf Bank Win Rate expectation, and the Trip Hours time limit. There is no allowance for the possibility that the Trip Bank might not last. Furthermore, they are the expectations for exactly the Trip Hours amount of play, which contrast with some of the Odds of Hitting GOAL stats, some of which assume that you stop play when you reach GOAL, regardless of whether the full Trip Hours have passed.

The stats displayed are all \$\$-based, and represent the range of final trip amounts that would statistically fall within plus and minus 1, 2 and 3 Standard Deviation expectations.

The Take A Random Walk screen:

Based on the statistics and probabilities you currently have displayed on the Trip Stats screen, this BJRM feature allows you to “take a random walk” down a representative trail of wins and losses that reflect the session-by-session cumulative fluctuations of a card counter’s bankroll. It is offered to help give you a feel for the effects that standard deviation can have on your results as they progress from the Short Run into the Long Run. Read 'em and weep, and, your mileage may vary.

This feature is very easy to use. You simply click the **Calc!** button to see a result. Before doing that, however, you have a few options from which to choose.

By Hour vs. All At Once: Governs the way the Random Walk Trip Chart is built.

If you select **By Hour**, the chart will be built one hour at a time, each hour requiring a click of the **Calc!** button. Keep clicking until you have a trip worth’s of hours (if you have not disabled it, an audible “beep” will sound as the last trip hour is displayed). Then, on the next click, a new trip will start, with its own hour #1. The previous Trip’s final total will be accumulated in the Lifetime total fields.

If you select **All At Once**, an entire trip chart will be built, all at once, with a single click of the **Calc!** button. You will see as many columns on the chart as you have specified hours in a trip. On the next click, an entire new trip’s worth of hours will display. The previous trips final total will be accumulated in the Lifetime total fields.

Auto Replenish Trip Bank vs. Enforce Trip Bank: Governs whether a trip ends if you happen to “tap out.”

If you select **Auto Replenish Trip Bank**, then the chart routine will continue with the Trip, even if, sometime during any Trip hour, you have tapped out — losing all of your Trip Bank, plus any winnings you may have accumulated since the Trip began. It will be as if you simply took a Marker, or otherwise replenished your trip bank.

If you select **Enforce Trip Bank**, the Trip chart routine will STOP if, at sometime during any Trip hour, you have tapped out — losing all of your Trip Bank, plus any winnings you may have accumulated since the Trip began. Unlike in real life, however, the screen will tell you what *would* have happened, this trip, if you *had* replenished your trip bank, and continued on. Regardless, the effect on the Lifetime totals will *only* be that of a Trip Bank \$ loss, unless you *also* select **Whole Last Hr**, which will subtract from your Life totals what your net result *would have been* at the end of the **hour** you tapped out in.

The reason for this last option, which seems to violate the “spirit” of the Enforce Trip Bank, is so that the Life totals will be more accurate in those cases where you have setup the Random Walk to have frequent Tap Outs. In those cases, without this Whole Last Hr option set, the Life totals might show more total Win than they should, since the sim data that the Random Walk routine is based on would have actually played out the round and hour you tapped out in, even if it went over Trip Bank by a bit. Of course, if you do have a reasonable Trip Risk-of-Ruin value, you would *not* want to check the Whole Last Hr option, as in those cases, losing only the Trip Bank is the better way to affect the Life Time totals.

No Beep: The program will sound an audible “beep” if you tap out of Trip Bank. It will also “beep” when you have accumulated a Trip’s worth of hours with the **By Hour** setting selected — warning you that the next click will start a new Trip. You can turn off these “beeps” by selecting this option.

Start Over: Clicking this button will clear all totals from the screen, Trip-based and Lifetime, allowing you to start the whole random walk process over.

Show Life and Show Trip buttons: As your completed Trips accumulate, you are building up lifetime totals, trip by trip. If you click the **Show Life** button, the Trip Chart will be replaced with a Life Chart that displays a graph of each Trips net result. Click the **Show Trip** button to return to the Trip Chart display. *Note:* If you have the **All At Once** option selected, and are displaying the **Life** Chart, then each click of the **Calc!** button will generate another complete Trip column, so that you can watch your lifetime results build Trip-at-a-time, just as you previously watched a Trip’s worth of hours build up.

Note: Whenever any graph is displayed, you can mouse-click on any column and the screen will display the exact Unit and Dollar amount that it represents.

Raw Stats: Click this button to toggle between the Charts and a display of the raw Trip Statistics, from the Trip Stats screen, that are driving all the Random Walk calculations.

Nadir and Zenith Data: At the completion of a Trip, text will be displayed, along the bottom of the graph, that will summarize the final Trip \$ total, along with the low (nadir) and high (zenith) \$ points you reached during the Trip.

The Random Walk screen statistics:

Latest Hour's Result: If **By Hour** is selected, this represents the \$\$ amount of the latest hour.

Trip \$ Total: The "so far" Trip \$ Total. Reset to "0" when a new Trip begins.

Trip Total Hands: The "so far" trip total hands, based on hours and hands per hour from the Trip Stats screen. Reset to "0" when a new Trip begins.

Trip Total Hours: The "so far" Trip hours. Reset to "0" when a new Trip begins.

Completed Trips: The number of completed trips. Updated when all trip hours are complete, or when you have tapped out.

SD: If **By Hour** is selected, this represents the Standard Deviation of the latest hour. If **All At Once** is selected, this represents the Standard Deviation of the whole Trip.

%: The % value, to the right of the **SD**, represents: (a) the % chance of the SD result, or better, if the SD was positive; or (b) the % chance of the SD result, or worse, if the SD was negative

Lifetime Unit Total: The "so far" net result, in # of units, of all your trip results.

Lifetime \$ Total: The "so far" net result, in \$\$'s, of all your trip results.

Life \$ Expectation: This is the result you "should" have accumulated, based on trip expectation, by this point in time. You can compare this field with the Lifetime \$ Total, to see how "lucky" you have been, so far. As you approach the Long Run, you should see Life \$ Expectation and Lifetime \$ Total converge. **Note:** In a manner of speaking, we'll all get there (convergence of actual results and expectation), just by very different paths. Repeated use of this Random Walk feature should drive that point home to you.

Life Hours: The "so far" lifetime hours.

Life Hands: The "so far" lifetime hands played or observed. Based on Trip Hours and Hands per Hour.

Back to: [Trip-based Calc](#) Help.

Lifetime Risk-of-Ruin Calcs

Whereas the Trip Calcs screen deals with Trip-length “sessions,” the Risk-of-Ruin Calcs screen calculates statistics from a “lifetime” bankroll perspective. It starts by requiring the same input as the Trip Screen — “Win/100” and “SD/100,” either entered or copied in from other BJRM screens.

After supplying a “lifetime” **Bank** amount, in “units,” and clicking on the “**Calculate**” button, several risk and expectation-related statistics will be displayed, including: the classic **Lifetime Bank Risk of Ruin** value; the number of hands and hours that must be played in order for the “units won” *expectation* to result in a **doubling** of your starting Bank; and six statistics that represent the number of **hands** and number of **hours** that will have to be played for expectation to equal **+1sd, +2sd, and +3sd** results.

Solve For Required Bank, Given a target ROR

This section, given a \$\$ Unit value and the level of Risk exposure you are prepared to live with (e.g. 5%, 10%, etc), will instantly tell you the number of Units and \$\$ Bank you will need to have underwriting your play. In addition, to help in comparing the “value” of different approaches to different games, the “**% Return on Bank per 100 hnds**” played (or observed, if back-counting) is shown. This statistic can be useful in weighing the value of your “time” spent in the casino, as it “normalizes” comparative data that may be based on different sized Banks and/or Units, and different playing strategies, such as “play all” versus “wonging.”

And, as with the other BJRM screens, you can print the screen image by clicking on the “**Print Screen Image**” button.

Systems 101

This screen is designed to give you a very basic introduction to several of the more popular card counting systems in use today. You can view the card tags of the systems, several “get you started” basic strategy departure indices, and a recommendation as to where you can find more information — book, Web site, etc. You can also access applets that let you:

Practice Card Counting:

BJClock, estimate your hands-per-hour, based on your style of play;
view **generic Basic Strategy**.

When the screen first loads, you will be offered a drop-down list from which to select a Card Counting System. You will also see a recommendation for a comprehensive blackjack wisdom book that I believe you simply *must* own, Don Schlesinger’s *Blackjack Attack: Playing the Pros’ Way*.

Counting Systems: Select from the several choices offered, e.g., hi-lo, K-O, AO2, etc.

The selected system’s card tags will be displayed, along with some basic system attributes (balanced or not, level, how True Count is computed, etc) and a multi-tabbed chart will appear that gives you access to about 25 of the most important indices. All indices were custom generated, using Karel Janecek’s Statistical Blackjack Analyzer software — another recommended “must have” (in addition to Don’s book) if you want to delve more deeply into particular counting systems and/or games and/or conditions.

Illustrious 18 and Fab 4 Indices: Click the various Tabs to view several of the most important basic strategy departure indices for the System you selected. The **Learn More** Tab may contain a book recommendation and/or a relevant Web Link. You can click the Web Link, and it will launch your Web Browser. Indices are shown for 1, 2, 4, 6 & 8 deck games. Refer to Don Schlesinger’s *Blackjack Attack* for a detailed accounting of how and why the Illustrious 18 and the Fab 4 were determined. The **Print** button on the Insurance Tab will send a listing of all the currently displayed Indices to your printer.

Important Note: All indices shown were computed based on **True Counting** the selected system. This is true for both balanced and unbalanced systems, and was done for ease, flexibility and consistency of display. The unbalanced systems true count-based indices were computed by setting the Initial Running Count (IRC) based on the standard formula: $- pivot \times \#-of-decks-in-play$. If you are one who True Counts unbalanced systems, that is almost certainly the way you do so. If you use an unbalanced system in Running Count mode, which is by far the usual method, do not be concerned, as BJRM has fully allowed for that, of course. Just read on.

Now, if you have selected an unbalanced card counting system, you will find that two additional items display on the screen: (1) an IRC-adjustment feature, and (2) several **Show Best Running Count At This Penetration** radio button choices. These two items are interrelated, and they immediately affect the values displayed in the Indices charts.

Show Best Running Count At This Penetration: These several radio button choices only appear when you have selected an unbalanced count system. Because of the nature of Running Count-based systems, the “best” running count at which you should make a basic strategy departure is sensitive to penetration, i.e. “where you currently are in the deck/shoe.” For example, in a six deck game, the Running Count for doubling 9 vs. dealer 7 may be one value early in the shoe (+12, say), another value halfway through the shoe (+6, say), and yet another very near the cut card (+2, say).

What unbalanced system players usually do, if they are playing in Running Count only mode, is to “average” or “weight-average” those different values down to *a single integer*, to be used regardless of penetration level. To give you maximum freedom to compute that value for yourself, or to enable you to make use of several penetration-based indices for a given departure, the radio button selections in this section of the screen allow you to specify a certain deck penetration level, whereupon the Indices Chart values are instantly adjusted to reflect that optimum running count, *at that exact penetration level*.

For example, if you are looking at the 6dk column of the Indices Chart, and you have selected the **2 left** radio button (indicating that two decks remain in the shoe), then the RC’s listed in the 6 dk columns (4dk & 8dk, also) of the chart will show the optimum RC for that departure “when 2 decks of the 6 deck (or the 4 or 8 deck) shoe remain. Now, “two decks

left” means: 4 decks are gone, for 6 dk; 2 decks are gone, for 4 deck; and 6 decks are gone, for 8 deck. The 2 and 1 deck columns are, in this case, showing the optimum RC before the very first card is dealt, as the **2 left** setting means, for them, that *all* the cards still remain to be dealt. Make sure you understand this example, as it is the key to the workings and meaning of the whole Index display for unbalanced count systems.

Note that it is also in the nature of unbalanced systems that some departure indices will change little, if at all, based on penetration. They are the indices that are at, or very close to, what is termed the system’s *pivot point*. It is beyond the scope of this Help file, however, to go into an explanation of Pivot. You can, perhaps, refer to the recommended literature, but for now just understand that at or very near the pivot, unbalanced systems, being played in running count only mode, are at their most accurate. When true counted, of course, they are always as accurate as their balanced counterparts.

The **TC** radio button choice returns things to True Count mode.

IRCs: The five fields in this section of the screen, which appear only when you have selected an unbalanced Count System, are there to allow you to adjust the IRC, based on “decks-in-play,” to the one you actually use — if different than the default. They work in conjunction with the Indices charts, and the **Show Best Running Count At This Penetration** screen section, to give you maximum flexibility in determining the indices you might wish to use for real life play.

Simply enter the IRC you wish to use (e.g. -20 for 6-deck KO), and click the **Apply** button. The associated values in the Indices Chart will immediately change to the appropriate values.

Note that if you have the **Show Best Running Count At This Penetration** set to **TC**, all the IRCs will be forced to - *pivot * #-of-decks-in-play*, regardless of what you have set them too. In other words, you must be in non-TC mode for the adjust IRC feature to work.

Practice Card Counting: When you click on “Practice Card Counting” on the top of the Systems 101 screen, you will be launched into a little applet that will let you practice counting cards, using the System you have selected on the Systems 101 screen. For Systems that use an Ace Side Count, the Ace Adjust factor will also be tracked.

You can count cards either one or two-at-a-time, and can either control the speed of the dealing yourself, via mouse clicks, or set a simple Auto-Deal slide bar that will display the cards at varying speeds, but will still you allow to Pause and Resume, if you need to.

Several Check Boxes give you some control over the data that is displayed, and one option will pause the drill just before the last card or cards are dealt, so you can “guess” what they are, before they are finally revealed. The Check Boxes let you:

- Deal One or Two cards at a time
- Hide the card tags, otherwise they will display next to the cards (good for beginners)
- Hide the Running Count
- Hide the True Count
- Hide the cards-dealt gauge
- Stop dealing just before the final card(s)
- Hide the Ace Side-Count adjustment data

The Check Boxes can be checked, and un-checked, at any time during the dealing of the cards, so you can, for example, hide the RC and TC, then halfway through, un-check them to see how you’re doing in your counting.

BJClock: When you click on “BJClock” on the top of the Systems 101 screen, you will be launched into an applet that will help you roughly estimate the number of hands you are likely playing, given the game conditions and your style of play, for Six deck and Eight Deck games. Estimating your “Hands-Per-Hour” is very important if you want to get reasonable estimates of your expected Win Rate.

As with “Practice Card Counting”, BJClock will use the Count System you have selected on the Systems 101 screen. Note: If you select a non-True Counted System, verify the 6 and 8 deck IRCs, which will default to (- #-of-decks * pivot).

To use BJClock, do the following:

Basic Settings:

- Select 6 or 8 Decks in Play
- Select Penetration
- Select the number of additional players at your table
- Select the number of seconds spent dealing to yourself and the dealer (12 default)
- Select the average number of cards dealt per player, per round (2.7 default)
- Select the number of seconds spent dealing to each additional player (6 default)
- Select number of seconds to shuffle a 6 or 8 deck shoe (100 and 140 defaults)
- Decide to enforce Shuffle time, or not
- Decide whether or not to spend time, and how much and how frequently, on Chip Buy-Ins (you and other players)

Style of Play:

- Select from among:
 - a) Play All;
 - b) Wong (can be used with Walk-Away, but once in a shoe, stays and bets every hand);
 - c) Classic Wong (once in, you will sit out hands as necessary, and leave based on Walk-Away TC/RC)
- Select Wong-In TC/RC, and select TC/RC at which you will place a bet, once at the table. The latter only applies to “Classic Wong” Style, as “Wong” style will bet all hands, once in shoe

Walk Away Strategy:

This section is where you can set, by depth of cards already dealt, the TC/RC at which you are either going to Walk Away from the table you have been Back-Counting, or Get-Up-And-Leave if you have Wonged In, and are playing the style where you depart if it gets bad (“Classic Wong”).

- Select Cards-Dealt depths,
- Select the TC/RC at and below which you will leave
- Decide whether to enforce a time penalty, and how much, to find a new table

After setting all of the above, click on Shuffle, and then either click Deal-A-Round, to step through manually, or Auto Do 50, 100, or 500 rounds. It should not take all that many rounds for your Rounds-Played-Per-Hour value to settle in.

The BJClock screen will show you several interesting statistics, including:

- The “wall clock” time that has gone by
- The time it took to play 100 rounds
- The number of rounds you have played and the number of rounds you have observed
- The number of shoe you have played and the number of shoes you have observed
- Once in a shoe, the average number of rounds you have played in that shoe

The applet will let you save your settings, and when you are in the One Sec Sim screen, you can copy in your “per hour” value, to adjust SCORE.

Build One Second Sim Files

This section of BJRM should be thought of as an “advanced” feature, and most users can safely ignore it. Its purpose is to allow you to supplement the pre-run One Second Sim files with your own custom generated data. Though it is designed to make that process as painless as possible, it does require some careful, deliberate work. Your reward will be the use of the One Sec Sim, and all other features of BJRM, for your custom simmed game conditions.

If you are going to attempt using this BJRM feature, you should read and understand this *entire* Help text section, before proceeding.

Note: You can skip directly to the “Select SBA File for Input” Help section by clicking [HERE](#)

OK, let’s get started.

First, a high level summary of what we will be doing:

1. Populating a grid (manual or automatic) with data.
2. Identifying/verifying the game particulars (Decks, rules, penetration, IRC)
3. Entering some descriptive text
4. Selecting a unique (or existing, if adding to) file name
5. Creating the file (just a button click)

There are two basic methods for populating the grid with data. You can enter it manually, or you can have BJRM automatically parse the output file text of a sim that you have previously run using Karel Janecek’s SBA, versions 3, 4, or 5, and using SBA output formatted as it was at end of year, 1999.

We’ll discuss the manual method, first.

Manual Grid Population

Before you start filling in the grid, you have to have the specific data values (see below) available to you, from some source. SBA is one good place, but several commercially available simulators can also either directly produce the data you will need, or enable you to derive it from the data they do produce.

You need to fill in 13 rows of data, 6 columns in each row. The rows will constitute either 13 True counts, or 13 Running counts. The first row and the last row are of a special type, being a “less than or equal to” row in the former case, and a “greater than or equal to” row in the latter. The true count-based One Sec Sim pre-run simulations, for example, usually use the range of –3 to +9, i.e., $\leq -3, -2, -1, 0, 1, 2, 3, 4, 5, 6, 7, 8, \geq 9$ for the 13 rows. However, you can use ANY combination of 13 rows you like. Just make sure you label them correctly. The screen will default to the ≤ -3 through $\geq +9$ range.

So, that explains the first column. It contains 13 integers representing 13 “bins” of count data, running or true.

The second column, **Freq %**, holds the frequency, to two decimal places, of the True or Running count(s) that the row represents, e.g., 4.56. The **Freq %** column should sum to 100% (99 and 101 are allowed, due to rounding). The screen shows a **Total** at the bottom, and provides an **Adj** button, described below, to help you settle on a 99-101% total, should rounding factors enter in and cause an initial value outside that range.

The third column, **Freq SE**, represents the **Standard Error** value of its associated **Freq %** value. The **Freq SE** is specified to six decimal places, e.g. 0.001415.

The fourth column, **EV**, represents the Expected Value associated with its row’s True or Running Count. This value can be positive or negative. Format is to three decimal places, e.g., 1.234 or –0.549.

The fifth column, **EV SE**, represents the **Standard Error** value of its associated **EV** value. The **EV SE** is specified to four decimal places, e.g., 0.0146.

Finally, the sixth column, **SD**, holds the **Standard Deviation** of the **EV** for the True or Running count “bin” that the row

represents. It is specified to four decimal places, e.g. 1.1642.

Automatic Grid Population

You will find a button on the screen labeled **Try to Auto Parse an SBA File**. Its purpose is to do just that — try to read in, and parse, the text output file of a simulation you have previously run using Karel Janecek's Statistical Blackjack Analyzer (SBA) program. As such, it is highly dependent on the exact text format of SBA's output file. Should that file format change in future releases of SBA, which is obviously out of this author's control, then this **Auto Parse** feature may become inoperable on the output of those versions. If that occurs, I will attempt to provide updates to BJRM. But as "tomorrow is promised to no one," this may or may not be possible. For now, I believe **Auto Parse** works reasonably well — provided you abide by the SBA sim setup particulars explained below, and, again, use the standard sim output of SBA versions 3, 4 and 5 of SBA, as they existed at year-end 1999.

The Auto Parse feature works in either a Default or Advanced mode. The Default (simplest) mode will be explained first.

Default Auto Parse

Default Auto Parse requires that when you run your sim in SBA, you set SBA up to produce sim output *for precisely 13 rows. No more, no less!* These, then, will map one-to-one to the 13 rows of data on the BJRM Build screen. Fortunately, it is very easy to set SBA up to do this. Here is how.

There are two sim configuration settings in SBA that you need to enter correctly. For SBA versions < 5, they are found under the "**Other Configuration**" menu. For SBA version 5, you can find them under the "**Simulation**" item of the "**Configuration**" Menu. In all versions of SBA, they are called "**Minimum Count Observed**" and "**Maximum Count Observed**." Together, they specify the range of True or Running Counts for which SBA will print output data.

For example, if you have them set at "-50" and "50" respectively, you would get 101 rows of SBA TC or RC data output. The first row would be ≤ -50 , the last row would be $\geq +50$, and in-between would be 99 individual rows, each for a single running or true count from -49 through +49, and including a row for 0.

Since Auto Parse in default mode needs to see *only 13 rows*, not 101, you need to adjust those SBA settings accordingly. Thus, you might set "**Minimum Count Observed**" to -3 and "**Maximum Count Observed**" to 9. This would create 13 rows of output — just what BJRM is expecting to see. Of course, **any** range that forces *exactly 13 rows* of output will do just as well, e.g., -5 and 7, -1 and 11, 0 and 12, etc.

Advanced Auto Parse

As just explained, in its Default mode, Auto Parse requires that you "feed it" an SBA output file of only 13 rows of core data. An implication of this, however, is that if you wanted to have a sim that allowed you to play around with bet patterns at negative TCs (to look at various wong-out options, say) *and* you also wanted to have a sim, of the same conditions, that stressed, instead, the very high TCs (where you experimented with very large unit bets), you would have to run two SBA sims, each favoring those categories in its 13 row consolidation, since one 13 row range would not be enough to cover both very low and very high TCs or RCs. This may be less than desirable. In addition, when simming count systems that are not true counted, the range of running counts required to cover bet spread patterns, especially for multi-deck, makes the BJRM 13 row Default parse feature effectively unworkable.

The answer to this is the **Advanced Auto Parse** feature, which you activate by selecting the Advanced Parse check box near the left bottom of the screen. Checking this box will give you access to three additional parameter settings, described below, that together will give you effective control over the consolidation of SBA output into the 13 rows that BJRM requires, from a base sim that covers many more than 13 rows.

Here are the additional parameters. In the **TC/RC of \leq :** input box, you tell the Parse routine the highest value (positive or closest to positive) that will be included in the first of the 13 rows — the one that holds the \leq bin. This row will then contain a consolidation of all the SBA output rows from the lowest (e.g., -50) to the value of the **TC/RC of \leq :** input box. You do not need to specify the lowest TC/RC value because BJRM can figure that out on its own. Based on the setting of **TC/RC of \leq :**, the remaining required 12 rows will be automatically determined based on the value of the

second settable parameter, the **Group TC/RCs By:**. This parameter is an integer, typically 1, 2, 3, or 4, that represents the number of TC or RC rows you want to consolidate into *each* of the next 11 bins. The final, or 13th, bin will be automatically made up of however many rows are left after computing the 11.

Some examples. Say you have run a -50 to +50 SBA sim.

If you set **TC/RC of <=:** to "-5", and **Group TC/RCs By:** to "1", and you will get the following 13 rows:

<= -5; -4; -3; -2; -1; 0; 1; 2; 3; 4; 5; 6; and >=7

You could then parse that *same* sim in a different way:

If you set **TC/RC of <=:** to "-1", and **Group TC/RCs By:** to "1", and you will get the following 13 rows, instead:

<= -1; 0; 1; 2; 3; 4; 5; 6; 7; 8; 9; 10; and >=11

If you change things again and set **TC/RC of <=:** to "-5", and **Group TC/RCs By:** to "2", and you will get:

<= -5; -4(&-3); -2(&-1); 0(&1); 2(etc); 4; 6; 8; 10; 12; 14; 16; and >=17

The 11 rows in the middle each have two TC/RC's worth of data in them.

And as a final example, consider a sim run for an RC-based system, such as KO for 6 deck, -24 IRC:

If you set **TC/RC of <=:** bin to "-15", and **Group TC/RCs By:** to "4", and you will get:

<= -15; -14; -10; -6; -2; 2; 6; 10; 14; 18; 22; 26; and >=27

Those settings should allow you to cover the range of RCs for a wide variety of bet spreads.

By the way, note that the "label" on the bin/rows always indicates the *first* TC/RC in the grouping.

The remaining settable parameter of the Advanced Parse feature is labeled **0 TC/RC in its own "bin"?** Its main purpose is to allow you to isolate the "0" True Count row, regardless of where it might otherwise fall based on the **Group TC/RCs By:** setting. The reason you might want to do that is because, in SBA output, the "0" TC bin is already covering a wider range than the other TCs, since it goes from -0 to +0. Checking the **0 TC/RC in its own "bin"?** setting will cut it out of the grouping formula of the **Group TC/RCs By:** value. Note, however, that you will have to make sure, based on the **TC/RC of <=:** value, that the "0" TC, were it not being singled out, would otherwise *begin* a **Group TC/RCs By:** grouping, and not fall somewhere within it.

Some examples should make all this clear.

If you have the **TC/RC of <=:** set to, say, -6, and the **Group TC/RCs By:** set to "3", then the bins will begin with <=-6, the next will contain -5 thru -2, then next -1 through +2, etc. This results in the "0" TC being within the "-1" bin, and is not allowed if **0 TC/RC in its own "bin"?** is desired. However, if you have the **TC/RC of <=:** set to, say, -5, and the **Group TC/RCs By:** set to "3", then the bins will begin with <=-5, the next will contain -4 thru -1, then next 0 through 3, etc. This "-5" starting setting *does* insure that "0" begins a new bin, so it is OK..

In any event, the program will detect if you have this set incorrectly, and will not allow you to proceed until you fix it.

Also, should any of the 13 bins end up with a TC/RC frequency % of **zero**, the input file **will not** be able to be parsed. Correct your settings and try again.

This concludes the explanation of the two ways of parsing SBA output. The following narrative continues the explanation of the entire process of creating a custom One Sec Sim input file.

Click [HERE](#) to continue on to "**Select SBA File for Input**" instructions.

Select SBA File for Input

Assuming that you now have such a specifically formatted SBA output file available on your computer, you can direct BJRM to attempt to parse that file, and in the process save you a lot of data entry.

Select the **Try to Auto Parse an SBA File** button to start the process. When you do, a new screen will pop up.

With this screen, you simply point BJRM to where the SBA output is located. This is done in a very standard Windows way, in that you click on the various screen lists, specifying the drive, folder, and finally file name of the SBA output file in question. With the file name highlighted (a mouse click will do it), you can then click on the **Display the File** button to see the contents of the selected file. This will let you verify that it is, indeed, the one you want.

When you have verified that it is, click the **Parse the Displayed File** button, and BJRM will attempt to parse the selected file, extracting just the data it needs. In the process, you will be automatically returned to the **Build** screen. If BJRM was successful, you should find the data Grid populated with the proper values. If not, you will, unfortunately, have to resort to the manual measures explained above.

Final Build Steps

Assuming the grid data is now correctly populated, only a few settings remain to be verified.

Sim Decks in Play: Select/verify the number of decks that were in play, for your base sim.

Sim Rule Set: Select/verify the rules that were in effect, for your base sim. You must pick from the available choices.

IRC: Select/verify the Initial Running Count that you used, for your base sim.

TC/RC: Select/verify whether your base sim was played by True Count, or by Running Count

Penetration Text: Enter the text that you want to display, based on this sim's penetration. You can enter anything you like. Examples: 4.5 of 6; 245 cards, 5 decks, etc. This Penetration text actually gets linked to a Sequence number (described next), and it is the Sequence number that the One Sec Sim will use to retrieve the Text for screen play.

Sequence: BJRM allows for only 4 unique Penetrations per individual file. Those four Penetrations can be at any level, but there can be at most four of them. If you add data based on different penetrations into the same One Sec Sim file, these Sequence numbers will keep them straight.

Enter Text Description of Sim Details: This is your opportunity to list relevant details about conditions of the sim not covered by the previous settings. You could, for example, list the number of players that were at the table, how many indices were used, whether or not you were allowed to re-split aces, etc. Whatever you type in this box will be displayed on the One Sec Sim screen, when you select this simulation.

File Name (system): Here you specify a unique file name, or an existing file name if you are adding to one you created previously. Try to select a file name that is somewhat descriptive of the sim details, as this file name becomes the text that appears in the **System** drop-down list of the One Sec Sim screen. Do not select a name that matches one of the canned sims that come with BJRM. You can see what those are by looking at the System list on the One Sec Sim screen.

Format Data: This button will "scrub" the data in the grid, to make sure that it is in the proper format. You can actually click this button at any time, even with an empty data grid, and you do not have to click it before clicking the **Save File!** button, as the **Save File!** does an automatic format. It is this button that sums the **Freq %** column.

Save File!: This, as you can probably guess, is the button that actually starts the formal process of creating the One Sec Sim file. It contains a number of edits, so, depending on how "clean" your data is, you may see some error messages that you will need to respond to. If your data passes all edits, you will see a pop-up message that says "New files were successfully created!." It says "files," plural, because the One Sec Sim actually expects the Frequency data in one file, and the EV data in another. You need not be concerned, however, as this is taken care of for you, behind the scenes.

Now, if you are adding more data to an already existing sim file (same file name), then when you click the **Save File!** button, you will be presented with a screen that will ask you some questions about how you want to merge the new data with the existing. How to use that screen (**Make Your Overwrite and Merge Choices**) is described further below in this Help file.

First, there are a few more screen buttons to explain.

Clear Data: Does just what it says. It clears all the data from the Data Grid part of the screen. Use with caution, or you may accidentally erase data you wish to keep.

Set Freq SEs: This button can be used to enter default Freq SE values. The entire Freq SE column is affected. You might want to use it if you are entering sim data manually, and the sim data you are working from does not include SE data for Frequencies. If that is the case, this feature will greatly speed up data entry.

Set EVs: This button can be used to enter default EV SE values. The entire EV SE column is affected. You might want to use it if you are entering sim data manually, and the sim data you are working from does not include SE data for EVs. If that is the case, this feature will greatly speed up data entry.

Make Your Overwrite and Merge Choices

This screen pops up when you are adding more sim data to an already existing One Sec Sim file. This happens, for example, when you are putting several sims into the same file, differing by Rule Set used and/or Penetration level.

New Sim Data: This display-only field indicates the file name, rule set and penetration level of the sim data you are adding.

Matching File Name Exists?: This Yes/No display-only field indicates whether or not a file already exists that has the same file name as the one you have supplied for the sim data you are now adding.

Matching Rules/Penetration Combo Exists?: This Yes/No display-only field indicates whether or not data in an existing file already has the same Rule Set and Penetration as the sim data you are now adding. When this is "Yes," you will be offered the chance to overwrite the old data, or cancel your changes.

Matching Penetration Exists?: This Yes/No display-only field indicates whether or not data in an existing file already has the same Penetration setting as the sim data you are now adding. When this is "Yes," you will be offered the chance to over-write the old Penetration data, or cancel your attempt to make changes. All Rule Sets for a given Penetration share the same TC/RC Frequencies. That is why you will be asked if you want to overwrite the existing Penetration (TC/RC frequencies) with those associated with the new Rule Set you are adding.

Completely Overwrite the Entire Existing File?: When a file already exists of the same name that you have just specified for your new data, you will be offered 3 choices as to what to do next: (1) You can overwrite the entire old file; (2) You can just add the new data to the file, leaving the data already there intact; (3) You can go back to the **Build** screen and start everything over again.

Sometimes, the second option listed above (add) is replaced by this one: (2) **No, give me some options.** You get this choice when data exists that matches both the Penetration level and the Rule Set. You will thus have to make one or both of the following decisions:

Action to Take on Penetration Data?: You can keep the old, or replace the old with the new.

Action to Take on Rules Data?: You can keep the old, or replace the old with the new.

Close button: Click to implement the decision you have made. A pop-up message will inform you of the action that BJRM took.

If you have successfully created or added to a custom file, you can now go to the One Sec Sim screen and immediately begin using it.

BJRM About

BJRM 2002 version information, copyright, and acknowledgements.

Blackjack Risk Manager 2002

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