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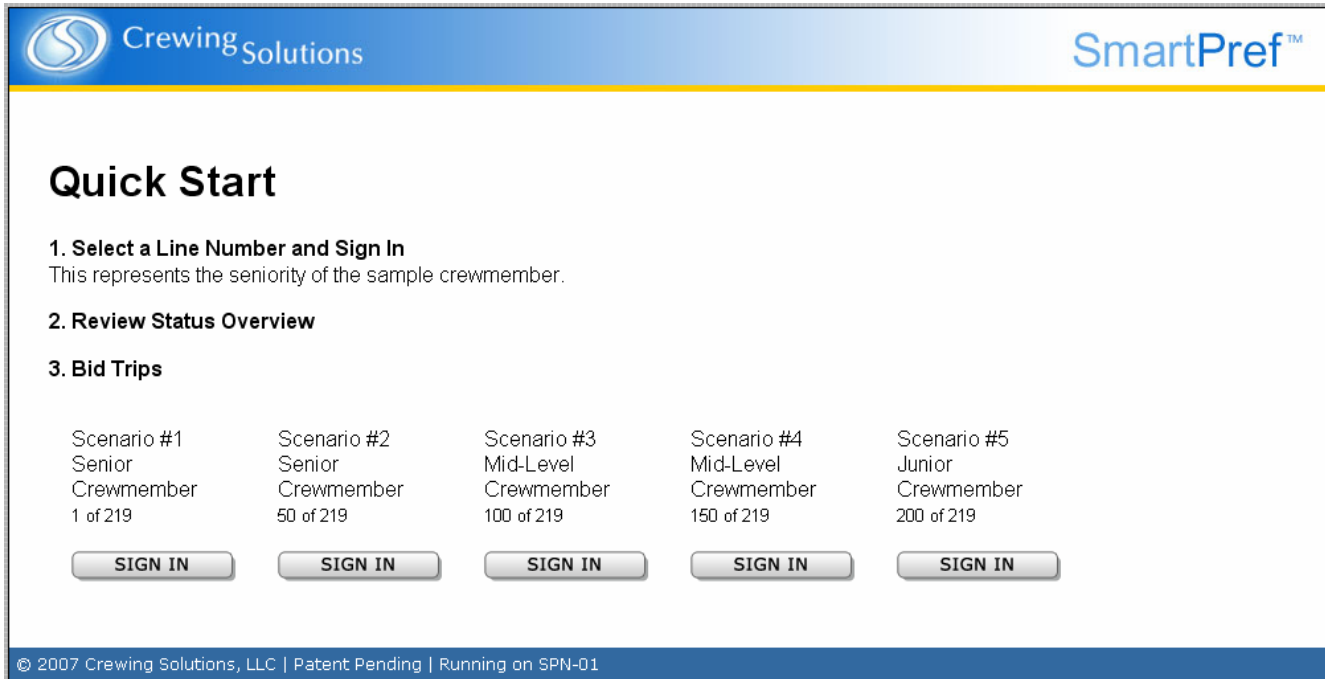
SMARTPREF  
Quick Reference Guide  
Preferential Bidding System  
Crewing Solutions' Online Demonstration

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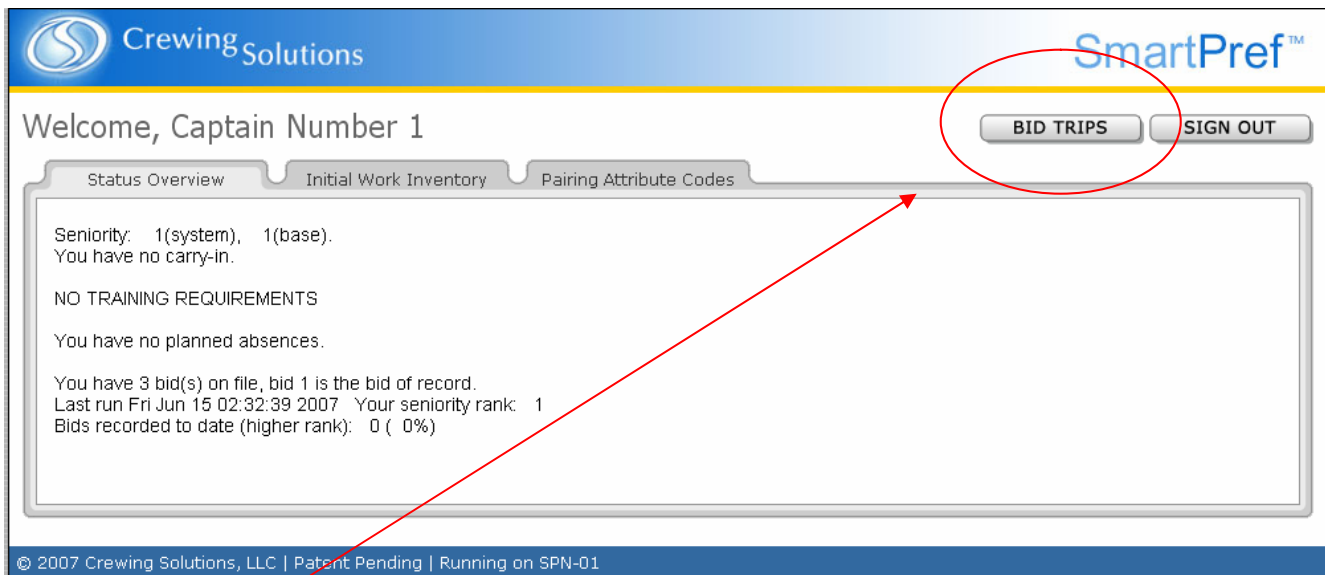
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**Starting Point –**



The SmartPref online demonstration puts the bidder in the position of a pilot who flies domestic trips at a typical major airline. Begin using the SmartPref PBS system by selecting one of the five crewmember positions shown above. In this bidding scenario, there are 219 hard lines (reserve lines are not included in this demonstration). The five available bidding positions represent varying seniority ranks within these lines.

When you click the SIGN IN tab for Scenario #1, the following Crewmember Home Page will be displayed:



Click on the BID TRIPS icon to begin bidding. (Skip to page 5)

## Crewmember Home Page

The information on this page comes directly from your airline's crew management system and will be updated at regular intervals during the bidding period. This information includes:

1. Month-end overlap (carry-in)
2. Training requirements, if any
3. Planned absences, if any

Additional information, critical to successful bidding, is shown on this page. This includes:



- When the SmartPref database was last updated (Last run...).
- How many of those senior to you have submitted current bids that replaced their standby bid. The higher the percentage of active bidders, the more accurate your preliminary bid award results will be.
- When the bids close.

This page will be customized to your airline's requirements

## Initial Work Inventory tab

The values that populate this screen will come directly from your crew management system or are calculated values by SmartPref. The information provides you with the key parameters during the assignment (i.e., min/max credit values, 30/7 buffer, etc.), availability of days off and an idea of the type and value of available trips for this period.

Note the critical days in the lower left hand corner of the screen. On these days, the number of crewmembers bidding for these days off surpasses the number of available days off. It is very probable that junior crewmembers will not be able to hold these days off.

Welcome, Captain Number 1

BID TRIPS
SIGN OUT

Status Overview
Initial Work Inventory
Pairing Attribute Codes

JUNE 1, 2005 TO JUNE 30, 2005      BIDDING CLOSES ON: 05/27 AT 08:00  
 BASE: EWR   POS: CA   EQPMT: B757   NO. OF CREW MEMBERS ON FILE: 254

14959 trip credit hours ( 338 c/o hrs) 1338 operations, 196 pairings.

Projected no. of line holders: 217   Last line holder: 217   RSV bids: 0   Absent: 0  
 Reserve lines: 37   Allowed open time: 0 hrs.   Total absent: 0

Total credit: 17961   Credit applied to line holders: 17297   Actual line average: 79:42   C/I credit hrs.: 409

1 day trips: 464   2 day trips: 543   3 day trips: 186   4 day trips: 145   5 day trips: 0   6 day trips: 0

Max/min hrs: 8500 7400   Max/min (max. hrs bid) 8500 8000   Max/min (min. hrs bid) 7800 7400

Duty periods: 2574   Avg. per DP: 5.94   Duty days: 2688   Avg per day: 5.69   Avg. duty days per line: 14.06



	WE	TH	FR	SA	SU	MO	TU	WE	TH	FR	SA	SU	MO	TU	WE	TH	FR	SA	SU	MO	TU	WE	TH	FR	SA	SU	MO	TU	WE	TH
ABS.	16	18	21	26	24	22	21	20	19	16	14	21	22	22	21	23	22	23	21	21	19	21	27	27	25	22	19	17	17	16
DUTY	111	116	123	120	110	112	108	107	105	111	108	107	112	109	108	109	117	117	107	111	106	108	113	122	119	108	109	104	104	102
RSV	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	
OFF	118	111	101	99	111	111	116	118	121	118	123	117	111	114	116	113	106	105	117	113	120	116	105	96	101	115	117	124	124	127
BID	3	3	3	89	175	134	0	0	0	1	80	154	126	1	0	0	0	80	205	125	1	1	1	1	74	161	107	18	1	1
NET	115	108	98	10	-64	-23	116	118	121	117	43	-37	-15	113	116	113	106	25	-88	-12	119	115	104	95	27	-46	10	106	123	126

Critical days: 5 6 12 13 19 20 26

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### Pairing Attribute Codes

You may bid for or against a given attribute. Attribute codes are used to group pairings that are commonly requested for or against by crewmembers. A trip may have multiple attributes.

Welcome, Captain Number 1

BID TRIPS
SIGN OUT

Status Overview
Initial Work Inventory
Pairing Attribute Codes

Valid trip attributes are:

- R = Red-eye
- C = Commuter
- I = International
- D = Domestic
- E = Early depart
- M = Mid-day depart
- L = Late departure

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Pairing Attribute codes used at a customer airline:

**Pairing Attribute Codes**

Attribute	Description
D	Domestic flights only
I	International, at least one international segment
E	Early trips – departing before 7:00 am
M	Morning trips - departing between 7:00 and noon
A	Afternoon trips - departing between noon and 16:00
L	Late trips - departing after 16:00
N	Night turns – 1 DP trips that fly across midnight returning after 2am
P	Positioning is required (at least one deadhead flight.)
F	Ferry flight(s) are present in the trip (Part 91 flight segment)
G	Ground School
T	Training
R	Reserve

**SmartPref Workbench**

We refer to this screen as the “workbench”. The top half of the screen displays that status of available trips and days off and the results of your most current bid. You bid in the bottom half of the screen beginning with the TRIP SEARCH tab.

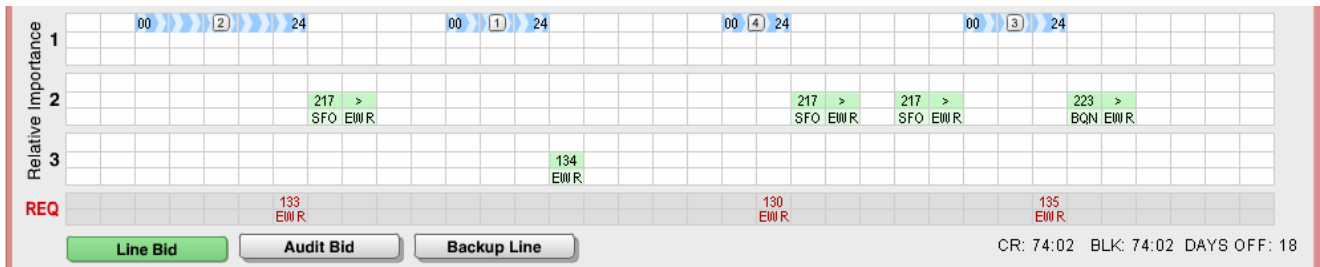
**Bidding Tabs**

There are 3 Bid OPTION Tabs plus RESERVE and STANDBY Tabs. The multiple OPTION tabs allow up to 2 additional ‘what-if’ bids simmering in addition to your “Bid of Record” which is identified by its red border. An example of multiple bid options might be one bid option for working Wednesdays through Saturdays, another bid option for the 10<sup>th</sup> through the 17<sup>th</sup> off and a third bid option to see if you can hold Monday, Tuesdays and Thursdays off beginning at 1pm. Prior to bid closing, make the one of these bid options, your bid of record as the bid of record will be awarded to you.

The screenshot displays the SmartPref Workbench interface. At the top, there are tabs for OPTION 1, OPTION 2, OPTION 3, RESERVE, and STANDBY. Below these is a calendar for JUNE 2005 showing days off and trip status. The main area shows a list of trip options with columns for TRIP, SIZE, SZ, DP, ON, DV, DEPARTING TIME, RETURNING TIME, ATT, BLOCK, CREDIT, LAYOVERS, and AUD. The first few rows of the list are highlighted in green, indicating available trips. A message at the bottom states: "Messages: There are 346 trips available for bidding. Your bid was: 0 AR+2 S2 LPHX LSFO LSAN+2 S2 D0800A R1900B+3 S1 D0800A R190".

### Line Display –

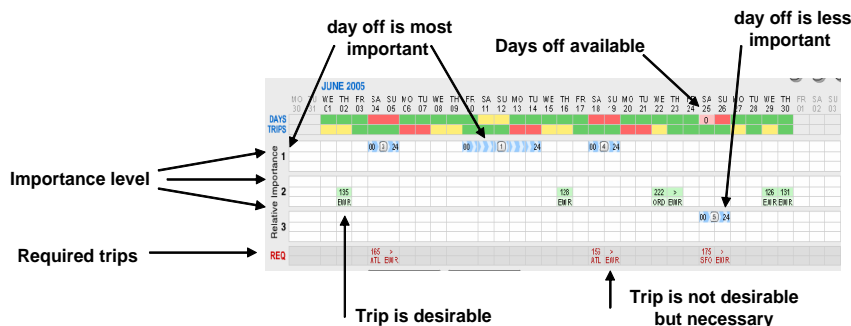
Four lines are used to show the results of your bid. The first three lines are referred to as Lines of Importance 1 2 and 3 and the fourth line is referred to as the “REQuired” line. Total block and credit hours and days off, shown in the lower right hand corner, reflect ALL of the trips shown on these four lines.



You may bid for days off and trips on any of the three lines of importance. Typically, trips are bid for at importance level 2 (more on that later) and days off are bid on importance lines 1, 2 and 3. We do this to eliminate any confusion as to what you prioritize as more important – the day off or the trip. Assuming all trips are bid at importance level 2, any day off bid on line 1 is more important and any day off bid on line 3 is less important than the trip. If you bid for days off on line 2 as well as trips on line 2, you’re telling SmartPref that getting the trip or the days off are of equal value.

SmartPref places trips on the fourth line, referred to as the Required Line, (grey color) that are:

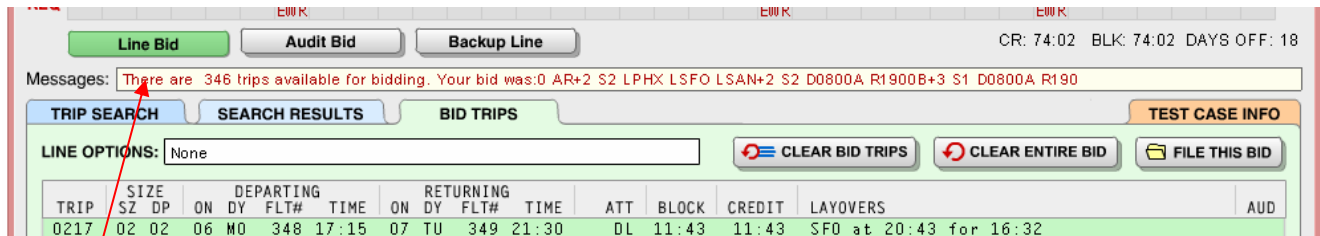
- In violation of a preference (days off or an avoid trip). These trips are shown in red.
- Neither desired nor to be avoided (sometimes referred to as neutral trips. These trips are shown in black
- Deemed mandatory by the system to cover critical periods. These trips will be shown in red.



To avoid confusion in the mind of the bidder, the bidder is given three lines to indicate which is more important – a day off or a trip. Having three lines to express days off solves that problem. The default is to bid for trips at relative importance 2. When having a day off is more important than a desired trip, the desired day off is indicated on importance level 1.

### Bid Results

In the middle of the workbench are three bid result icons and the message line. The number of trips available for bidding is NOT the total number of trips remaining; it is the total number of trips that you are legal and available to work. Trips that conflict with vacation, month-end transition, training or other planned absences are not included in this total.



**LINE BID** – the line awarded to the crewmember, when the bidding period ends and, more importantly, is the Bid of Record (the Bid of Record is identified by its red border).

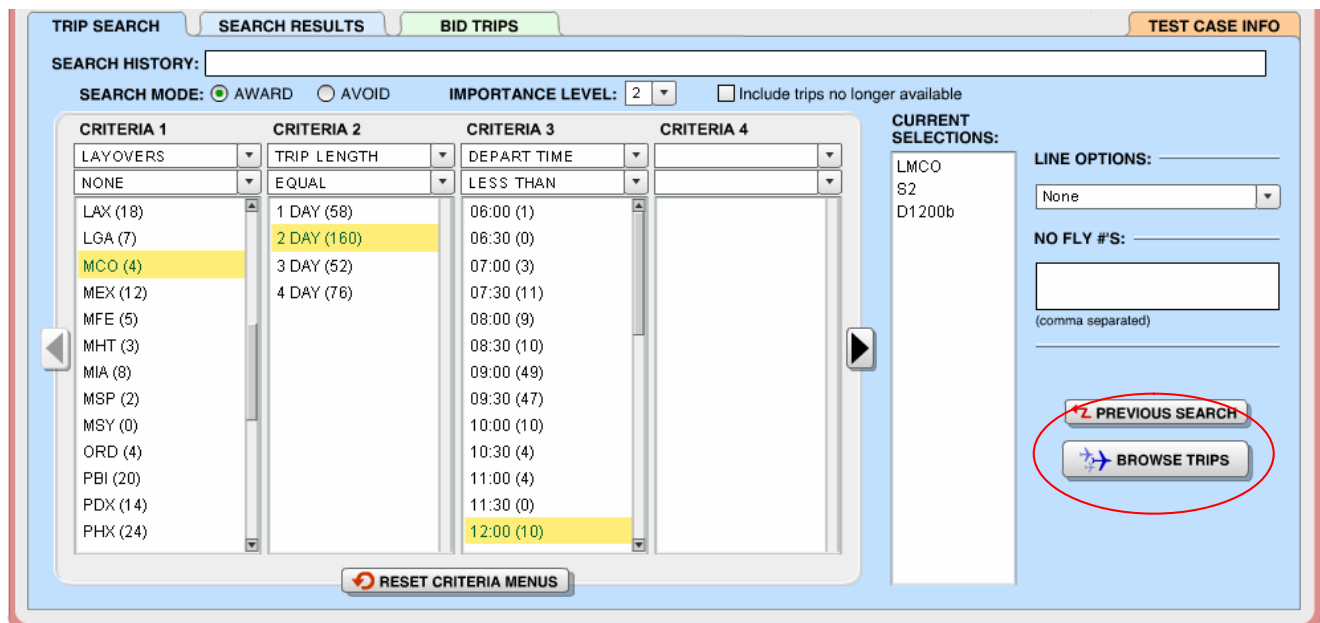
**AUDIT BID** – hypothetical line built by following, in sequential order, the trips as they have been ranked by you. SmartPref will assign the first pairing and the next pairing (unless the combination is illegal) and so on until a legal line is built. Allows the bidder to see the reason specific trips were not awarded.

**BACKUP Line** – the backup line shows you what you would fly if all of the green trips in your LINE Bid were no longer available. The odds of this happening are extremely remote but theoretically possible. If you click on the Backup Line icon and see another great line (all green trips), you have given the line builder enough choices so that the ‘loss’ of one or more of the original green trips won’t prevent you from getting a satisfactory line.

If you click on the Backup Line icon and see hardly any green trips and many black (neutral) trips, you have not given the line builder enough trips to work with should your original green trips go senior. Expanding your bid will give the line builder more options.

**TRIP SEARCH / BID ENTRY**

In the bottom half of the workbench, there are three tabs showing – TRIP SEARCH, SEARCH RESULTS, AND BID TRIPS. The fourth tab – TEST CASE INFO – is there to help teach you how to bid and would not be there in a production system.



Within ‘Search Trips’, you should enter your preferences for or against trips and/or selects certain line building options and then presses the BROWSE TRIPS icon.

After the BROWSE TRIPS icon is clicked in the previous screen, all the trips that meet the criteria of the TRIP SEARCH phase are displayed in the order specified by your bid. Trips with dark color highlights are in direct conflict with higher importance level days off preference. SmartPref will not consider these trips when building your line. Trips with lighter color highlights are in direct conflict with lower importance level days off preference. SmartPref will consider these trips and, if possible, honor both the trip and days off preference.

Trips that are not highlighted do not conflict with requested days off. When the mouse is moved over a trip, the line turns yellow and you may click on that line to see the detail of the trip. If you do not like the selection, you will void it (not remember it) by simply clicking on TRIP SEARCH again. On the other hand, if you like the trips selected, click on the ADD TO BID icon. The system immediately generates a line based on your last selection AND prior selections (if any) and you will be taken to the 'Bid Results' tab.

TRIP	SIZE	DP	ON	DY	FLT#	TIME	RETURNING	ATT	BLOCK	CREDIT	LAYOVERS	AUD
0113	01	01	19	SU	1411	07:45	19 SU 1783 14:14	DE	05:39	05:39		
0118	01	01	19	SU	1418	08:00	19 SU 858 14:44	DE	05:49	05:49		
0121	01	01	19	SU	388	08:05	19 SU 44 16:19	DE	06:19	06:19		
0123	01	01	19	SU	376	08:05	19 SU 477 15:02	DE	05:58	05:58		
0155	02	02	19	SU	448	07:00	20 MO 449 06:08	DRE	11:23	11:23	SFO at 10:15 for 11:45	
0158	02	02	19	SU	1535	07:00	20 MO 1534 16:57	DE	10:07	10:07	PHX at 10:35 for 23:50	
0176	02	02	19	SU	548	08:50	20 MO 549 19:34	DE	11:39	11:39	SFO at 12:10 for 23:05	
0181	02	02	19	SU	1053	09:00	20 MO 1848 19:44	DE	10:00	10:00	SLC at 12:21 for 24:44	
0271	04	03	19	SU	1473	08:45	22 WE 1044 19:12	DE	21:11	21:11	TUS at 12:23 for 20:17/PVD at 21:39 for	
0279	04	03	19	SU	846	09:00	22 WE 452 13:45	DE	19:34	19:34	DEN at 15:11 for 16:49/MHT at 21:50 for	
0236	02	03	23	TH	1167	08:00	24 FR 1472 05:26	DRE	13:42	13:42	TPA at 18:56 for 11:54	
0266	04	04	23	TH	1418	08:00	26 SU 1700 22:50	DE	20:23	20:23	CLE at 19:50 for 23:20/RSW at 21:59 for	
0276	04	04	23	TH	871	08:55	26 SU 1293 21:34	IE	24:26	24:26	SXM at 14:00 for 24:50/MIA at 22:39 for	
0183	02	02	24	FR	1626	09:00	25 SA 1186 20:12	DE	13:59	13:59	SAN at 12:10 for 18:50	
0274	04	03	24	FR	1781	08:50	27 MO 1680 23:44	DE	22:02	22:02	SEA at 11:54 for 25:01/SEA at 21:01 for	
0277	04	04	24	FR	871	08:55	27 MO 1158 21:47	IE	20:29	20:29	SXM at 14:00 for 24:50/MIA at 22:39 for	
0156	02	02	25	SA	1169	07:00	26 SU 1800 18:11	DE	10:06	10:06	ATL at 09:36 for 22:43	
0157	02	02	25	SA	1535	07:00	26 SU 434 06:01	DRE	09:56	09:56	PHX at 10:40 for 13:05	
0165	02	02	25	SA	1175	08:45	26 SU 319 18:28	DE	15:09	15:09	ATL at 19:35 for 12:25	
0168	02	02	25	SA	1435	08:45	26 SU 1534 16:57	DE	10:07	10:07	PHX at 12:20 for 22:05	
0175	02	02	25	SA	548	08:50	26 SU 549 19:34	DE	11:44	11:44	SFO at 12:15 for 23:00	

Showing 64 - 84 of 100 results. 1 2 3 4 5

The third tab – **Bid Results** – shows all of the trips in the order in which they were considered by the system in building the line. Trips highlighted in **GREEN** have been awarded you. Trips that are not highlighted could not be assigned to you for the reason given in the far right column – the audit trail column. In addition, there are two other icons – ‘Clear Bid Trips’ and ‘Clear Entire Bid’. We’ll explain those during the Bid Entry process.

TRIP	SIZE	DP	ON	DY	FLT#	TIME	RETURNING	ATT	BLOCK	CREDIT	LAYOVERS	AUD
0205	02	02	03	FR	1151	15:30	04 SA 1158 21:46	DM	12:43	12:43	ELP at 21:49 for 11:26	
0266	04	04	09	TH	1418	08:00	12 SU 1700 22:50	DE	20:23	20:23	CLE at 19:50 for 23:20/RSW at 21:59 for	
0280	04	03	09	TH	1011	09:20	12 SU 1686 05:01	DRM	18:49	18:49	SAN at 15:57 for 21:03/SNA at 22:20 for	
0287	04	04	09	TH	621	15:25	12 SU 310 22:51	DM	22:07	22:07	DFW at 22:03 for 17:27/PBI at 22:21 for	
0269	04	04	10	FR	1175	08:45	13 MO 1255 14:15	DE	25:14	25:14	ATL at 19:35 for 12:25/PHX at 15:37 for	
0274	04	03	10	FR	1781	08:50	13 MO 1680 23:44	DE	22:02	22:02	SEA at 11:54 for 25:01/SEA at 21:01 for	
0281	04	04	10	FR	148	11:35	13 MO 1152 19:06	DM	22:24	22:24	SFO at 14:54 for 15:36/BOS at 18:13 for	
0286	04	03	10	FR	1181	14:45	13 MO 1010 22:09	DM	20:53	20:53	DEN at 22:15 for 10:40/LGA at 20:12 for	
0157	02	02	11	SA	1535	07:00	12 SU 434 06:01	DRE	09:56	09:56	PHX at 10:40 for 13:05	
0165	02	02	11	SA	1175	08:45	12 SU 319 18:28	DE	15:09	15:09	ATL at 19:35 for 12:25	
0168	02	02	11	SA	1435	08:45	12 SU 1534 16:57	DE	10:07	10:07	PHX at 12:20 for 22:05	

### Bidding Days Off

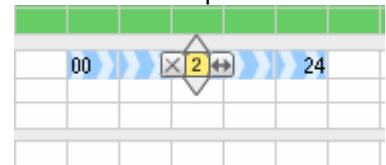
To enter a single day, click twice in the upper box of the desired day off.

To enter a range of days off:

1. Click once on the most important day off at the importance level desired
2. Click again on the hour when you want the day off to begin
3. Without holding any key down, drag the pointer to the end of the range of days off.
4. Click once on that day off
5. Click again on the hour when you want the day off period to end.

To delete a day off or range of days off, click on the X which will appear when you move your mouse cursor over the number in the unwanted day off or range of days off.

To change the priority within a range of days off, click on the double arrow which will appear when you move your mouse cursor over the range of days off in question. The priority of periods of time off is important when defining long periods since it indicates to SmartPref how to infringe on days off if it is necessary to do so in order to complete a line.



To duplicate a range of days off, simply drag a copy of that image to another location. To do this, click anywhere on the blue portion of a range of days off and, holding down the mouse key, drag the image to the next desired period and release the mouse button.

### Bidding Trips

Begin the process by clicking on the TRIP SEARCH tab. Beginning with the first Criteria window, enter your trip preferences. The preferences selected in these windows (and summarized in the current selections box) require that ALL preference criteria must be satisfied for the trip to be selected and shown in the SEARCH RESULTS window.

Sample bid: Early morning 2-day trips that layover in MCO.

In CRITERIA 1 window, define a preference for LAYOVERS in MCO.  
In CRITERIA 2 window, define a preference for 2-day trips  
In CRITERIA 3 window, define a preference for trips that depart before 1200.

With most TRIP SEARCH criteria, the second or lower drop-down menu in each criteria window provides further definition. An example of this is shown with DEPART TIME below. The default is EQUAL which includes all trips plus or minus 15 minutes.

Next step:

Click on the BROWSE TRIPS icon. In the SEARCH RESULTS tab all of the trips remaining at your seniority that match ALL of the criteria will be shown.

Next step:

- 1) Review the displayed trips. Trips that are not highlighted do not conflict with any desired days off. The trips that are highlighted in a dark color conflict with days off preferences entered at a higher importance level. Trips that are highlighted in a lighter color conflict with days off preferences at a lower importance level.
- 2) If you want to add these trips to your bid, click ADD TO BID icon. The system will immediately display the results of this latest bid. (Note: trips that conflicted with days off of a higher importance level are shown but not added to your bid).
- 3) If you DO NOT want to add these trips to your bid, return to TRIP SEARCH icon to define other bid criteria.

Most of the time, bidders use the TRIP SEARCH functionality to see what is available – not all TRIP SEARCH inquiries have to end with an ADD TO BID.

Important rules:

1. If two or more search criteria are defined, both search criteria must be met before the trip is selected.
2. When ADD TO BID is clicked, the selected trips are moved from the neutral pool to the bid pool and thus cannot be selected again. What this really means is that if you introduce a global specification first you will not be able to be specific within that global specification. I.e., It is best to define the specific layovers you wish before you define that you want multi-day trips.
3. The exception to the ADD TO BID is the AVOID function. The AVOID function takes trips from your bid pool and the neutral pool and ranks them last.

#### **QUICK TIPS**

*The F11 key will remove the Windows Explorer banner from the top of your screen, giving you more SmartPref viewable space. Press F11 again to return to normal status.  
SmartPref follows Windows standard conventions for selecting multiple list items*

*To select multiple items in a sequence, select the first item, hold the SHIFT key, move to the last item, Left Click.*

*To select multiple items not in a sequence, hold the CTRL key, select multiple items.*

#### **Bidding for Training**

Crewmembers may bid for specific training dates. It is important to realize that if you fail to bid for a required training event, SmartPref will automatically consider your general bid preferences when assigning training. Available training slots are located under ATTRIBUTES in the Criteria pull-down menu.

These training events are stored as pairings. To see what Training events remain at your seniority level, click on Training and BROWSE TRIPS.

To bid for a specific PC event, the crewmember returns to the TRIP SEARCH tab, clicks on Pairings listed in the criteria menu and selects the PC training events desired. (Current numbering convention is that 1600 series pairings are training pairings.)

### **RESERVE Tab / Reserve Bidding**

Any pilot, regardless of seniority, may bid for reserve. The process for bidding reserve is the same as bidding for a regular line:

- Enter desired days off in the calendar display
- Click on Reserves under the TRIP SEARCH tab.
- Click on the reserve type desired R1, R2 and/or R3.

With the exception of the last reserve line, all reserve lines will be pure reserve and pure in type.

If you are a senior pilot who wants to bid reserve, you must file your reserve bid and make the reserve bid your BID OF RECORD.

If you are a junior pilot who normally holds reserve but sometimes holds a regular line, you should bid both a bid option and reserve. Be sure to make the line bid option your BID OF RECORD. If you cannot hold a line of time, the system defaults to your reserve bid automatically

### **STANDBY Tab / Standby Bidding**

Every month when bidding is opened, your Standby bid is the bid of record and displayed in OPTION 1. Unless you modify and file an option with new preferences, you will be awarded your Standby bid!

Note: Every pilot has a system default Standby bid of flying Mon, Tues, Wed... order of preference on your initial opening bid. Once you enter and save your own Standby bid preferences, your preferences are the default. Things to remember:

- Your standby bid is stored and used monthly to generate your initial schedule.
- You may update your standby bid anytime throughout the month
- If you fail to bid, your monthly schedule will be based on your standby bid

To enter a STANDBY bid:

- Click on the STANDBY tab
- Define days off in the TRIP SEARCH tab – not in the Calendar display
- Define desired trip attributes in the TRIP SEARCH tab
- Your Standby bid may be for Reserve
- File your bid.

## BIDDING

### Bidding Process

The bidding process is iterative and incremental. Build your bid in stages, starting with the specific and most important going to the more general and least important.

- 1) If you enter a bid for a single trip and that trip is available, SmartPref will award the trip to you but other trips will be added as well so that the total block and credit is within the stipulated minimum and maximum values. These other trips are called neutral trips because the crewmember did not preference them and are shown on the grey line (the 4<sup>th</sup> line of the 4 lines).
- 2) The ADD TO BID icon takes the trips shown in the Search Results window out of the un-bid for category and adds the trips to the bid-for category. Each time the 'add to bid' icon is activated, SmartPref rebuilds a line based on the selected trips given up to now. A complete bid is generally the sum of successive 'add to bid' operations.
- 3) You are allowed to bid a combination of choices that are not necessarily consistent or even possible to achieve. A bid for more days off that you can hold is a valid bid or bidding trips that conflict with each other and/or with days off is valid. You need to be concerned with the consistency and feasibility; in all instances, SmartPref will return a legal line of time to you with the best selection in accordance with your priorities.
- 4) Automatic Bid Degradation Process. When your request cannot be 100 percent satisfied, as it would be if you bid from the 1<sup>st</sup> through the 30<sup>th</sup> off, the system will nevertheless build you a line with as many days off at the beginning of the month using the trips for which you had expressed a preference. In general if your bid for days off cannot be honored, the system will degrade from the least important day back to the most important day, so it is not necessary to worry whether the bid you have given is completely feasible or not.. If you request a line consisting of two-day trips with layovers in SEA, SFO and LAX (in that order), and weekends off, the system will first try to build the line with weekends off and SEA layovers. If such a combination is not available, one of two avenues will be followed depending on the relative importance of days off and trips: (a) days off are more important, then SFO, LAX and other trips, in that order, which do not infringe on your days off will be considered to complete your line, or (b) the days off are equal or less important than the trips you have selected. In which case the trips you want even if they infringe on your days off will be considered first, i.e. 2 day trips to SEA, SFO and LAX that has in the first instance a one day infringement and in second instances a two day infringement.
- 5) The system does not allow you to enter an invalid bid. You cannot enter a bid that is invalid since all of your choices are menu driven based on existing trips. With some other systems on the market, the crewmember can bid for pairings that do not exist and days off in prior or future months.

### **Bidding Strategies**

- Know and consider what days off and trips remain available at your seniority by reviewing the DAYS and TRIPS information shown immediately above the calendar display (place the mouse over the appropriate block).
- Define desired days off in the calendar display
- Bid trips from the specific to the general.
- Bid positively. If you must use AVOID, save it for last
- Use the TRIP SEARCH functionality to see what's available, what you like and dislike.
- Use the BACKUP function to determine if you have bid sufficiently
- LINE OPTIONS (on the bottom right) are global constraints and prevail over preferences defined in the CRITERIA windows.

**General Considerations:**

The pairings are ranked according to your bid criteria and SmartPref relies on this ranking to generate your schedule. This is important. A simple example explains the point - If want 2-day SJU layover pairings over other 2-day pairings, bid the 2-day SJU layovers first, then bid for 2-day trips.

Define days off to make sure that SmartPref recognizes your priorities. SmartPref is only able to act on what it knows; the more it knows the better the outcome; and more importantly, the more reliable and predictable the outcome becomes.

If two or more search criteria are defined, both search criteria must be met before the trip is selected. For example, the crewmember wants 2 day trips and layovers in SEA. Only trips meeting these two criteria are selected. In short, an AND relationship must exist.

Once a search criterion has been met and added to bid, the trips selected by the search criteria are no longer available to be selected except with the AVOID function. For example the only trips with layovers in JFK are two day trips and you have already added to bid the two-day trips, when you search for layovers in JFK, SmartPref will advise that no trips matching that criterion are available. Do not confuse available with exist – the JFK layovers exist but they are not available because they have already been added to your bid.

The criteria list in the online demo is not exhaustive. Additional search criteria may be needed to meet the unique environment of your airline. Anything within a pairing may be searched. For example, sit time within a pairing, report time away from base, ground time, layover length, etc.

## TEST CASE 1

You are at the top of the seniority list -- all trips offered are available to you. The line displayed shows a typical high-seniority bid -- the first week off, weekends off and very specific trip selection. As you move down in seniority, that precision is less predictable and a broader trip selection must be given. Seniority position 1 is the only person who does not need to worry about his backup line.

This is an ideal test case for sharpening your bidding skills and navigating the options available. Clear your trips by clicking the "Clear Bid Trips" on the "Bid Trips" tab (your days-off request remains), then click on the "Trip Search" tab and look at the various search criteria available. Make selections using one or more criteria (see help on "How to Bid Trips"), and click on "Browse Trips". If you decide to "Add to Bid", a line will be built using the trips selected. If the trips selected do not make a complete line, "filler" trips will automatically appear in the required calendar. You can then make additional trip selections and "Add to Bid" again. Then try experimenting with bidding days off (see help on "How to Bid Days Off") -- clear the entire bid and formulate your own bid.

## TEST CASE 2

You are at seniority level 50 out of 219 -- you are still very senior and can expect to get what you bid for. You have a vacation period which you are extending by requesting days off immediately before and immediately after (notice the directions of the arrows on those days-off selections). You have requested a specific trip (267 on the 22nd) and high-yielding 4-day trips. In addition, you have selected the "Min off 4" line option requiring days-off periods to be at least 4 days long. Looking at the results you see that were not awarded your first choice trip 267. Why? Click on audit line. This shows the trips in order they were bid and the resulting line when awarded in sequence, there you see trip 267 but you will see that the builder was unable to finish the line with any other 4-day trips. This was due to the 'Min off 4' line option. Line options are forcing constraints. SmartPref will always return a line that abides by the selected line option, even if it requires using undesirable trips and the 'line bid' is probably closer to what you had in mind. However, choice #1 could not be awarded in order to preserve all of your days off and trip selections. Had you bid with the 'Min off 3' line option (view option #2 as an example), or had you shortened the day-off period after the vacation by one day (view option #3 as an example) you could have maintained the 4 days off constraint.

## TEST CASE 3

You are nearly halfway down the seniority list. Notice the training period you are scheduled for and the fact that you have a carry-in. All special and personal activities are reflected with their associated credit so that the line built around them is legal and within the stipulated utilization. SmartPref is very good at honoring long consecutive days-off periods -- option #1 has a 7-day period bid off and the option #2 has a 9-day period. When you bid long days-off periods, remember the 1 in 7 requirement and the average number of work days needed in the month. Option #3 illustrates long weekends -- see if you can improve on it. Always check the audit line and try to bid so as to make the line bid and the audit line the same.

## TEST CASE 4

You are now 150th in seniority out of 219. The heavy demand for weekends off is being felt. Navigate the cursor over the available days at the top of the calendar (top line). Notice that on days 5 and 27 there are no available days off left and hence you will be "forced" to work on those days (trips are shown in red at the bottom of the calendar, in the required line). However, the good news is that the trips assigned on those days respect your

other preferences. The bid for all weekends off at your seniority level is probably too ambitious -- other bidding strategies could be more fruitful. Option #2 put trips and days off at the same level so that you get either the day off or the trips that are willing to work, if SmartPref can give you both it will (see option #3). With your bid being continuously updated, you can gauge the level of availability for both days off and trips, and bid accordingly.

#### TEST CASE 5

At the very junior levels, availability becomes restricted and combinations that make a complete line become fewer and fewer. As would be expected, there are no weekend days off left and hence it would be poor strategy to bid them. Options #1 and #2 are unrealistic, at that level the bidder should look carefully at the available days off and the inventory of remaining trips and bid accordingly such as in option 3. Another possibility of course is to bid reserve where a junior line holder elects to have a reserve line with the days off that were no longer available to line holders. Click on the 'Reserve tab' to view a typical reserve line. At this junior level, many scenarios should be tested. SmartPref allows you to find choices you can live with to a greater expectancy than ever before