

User's Manual

GALACTICA

SWIMMING INTERFACE



3311.545.02

Version 1.4 Edition March 2008

CAUTION

- □ The information contained within this document may be modified without warning.
- Swiss Timing LTD cannot be held responsible for errors within this document nor for any subsequent nor consequential damages (including loss of profit) arising from its provision, nor performance or use of products described herein, which will be covered by another guarantee, contract or other legal document.



TABLE OF CONTENTS

1	INT	FRODUCTION – SWIMMING INTERFACE	1
	1.1	The Swimming working space	2
2	PR	EPARATION OF THE DATABASE	
	2.1	Editing the competitors	3
	2.1.	.1 Display	3
	2.2	Editing competitor information	4
	2.3	Editing global values	5
	2.4	Selecting competition to process	6
	2.5	Editing titles and records	7
	2.6	Launching the starting lineup	8
	2.7	Serial interface connection	10
	2.8	Editing the results	
	2.9	Generated images and functions	
	2.9.	.1 Sending an image to the Display Director	13
		.2 Images management	13
		Functions and images: use	
	2.10	0.1 Swimmer's presentation	17
3	Co	mpetition managed by the ARES	18
	3.1	Settings on Swimming program	18
	3.2	ARES21 Swimming program: How to do ?	



1 INTRODUCTION – SWIMMING INTERFACE

The Swimming program manages swimming competitions, and provides the interface between the timer (ARES21) and the scoreboard matrix software; it generates the competitors' file containing information on the contestants in various sports.

For each contest, the operator compiles a starting lineup by importing data from the competitors' database. This list will then be updated automatically by information from the timer (elapsed time and final time).

A variety of functions allow displaying this information by lane, sorted by the result, or according to a flexible format defined by the operator.

Summary of operations to be performed

- Launch program
- Test and connect serial interface
- Open window to display generated image if the image is not already on the screen (View Actual Image function, or <F9>).
- For each competition:

For competition managed by GALACTICA – Swimming interface:

- Select competition
- Check starting lineup; if it has not yet been created, construct it.
- · Check titles.
- Check records to beat.
- Select Start function (Start button).
- Send image to display (<F5>).
- Activate serial interface (Activate Competition function or (<F6>).
- ...
- Deactivate serial interface (<F6>).
- Select Result function (Result button).
- Send image to display (<F5>).
- If this is the last heat, select Summary function and send image to display.

For competition managed automatically by ARES – Swimming:

- Check the check box "Automatically set by ARES"
- Send image to display (<F5>).
- Activate serial interface (Activate Competition function or (<F6>).
- Follow competition and send all commands like *Results*, *Summary*, from ARES Swimming program.



1.1 The Swimming working space

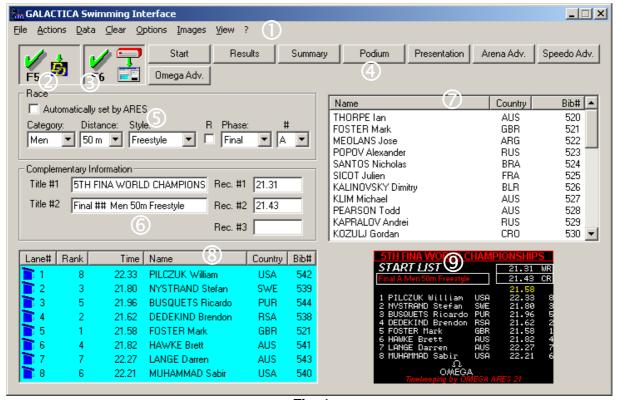


Fig. 1

The Swimming program dialog has several zones:

- ① The main window with menu bar
- ② The Connection button with *Display Director (DD)*
- 3 The Connection button with timekeeping device (ARES 21)
- 4 The image selection bar (4 predefined images and 12 free available images)
- ⑤ The competition selection area
- © The area reserved for the titles and records of the competitors
- The competitors list box with the list of competitors
- The list box with the starting lineup
- Option: image currently displayed

2 PREPARATION OF THE DATABASE

2.1 Editing the competitors

2.1.1 Display

The right-hand side of the screen is reserved for the *list box* of the competitors file (Fig. 2).

Each line displays the following information:

- last name, first name
- nationality abbreviation
- number of competitor

Name	Country	ВіЬ# ▲
THORPE Ian	AUS	520
FOSTER Mark	GBR	521
MEOLANS Jose	ARG	522
POPOV Alexander	RUS	523 💳
SANTOS Nicholas	BRA	524
SICOT Julien	FRA	525
KALINOVSKY Dimitry	BLR	526
KLIM Michael	AUS	527
PEARSON Todd	AUS	528
KAPRALOV Andrei	RUS	529
KOZULJ Gordan	CRO	530 💌

Fig. 2

This list box is sorted according to one of the three modes defined by the dialog:

- by alphabetical order of names
- by alphabetical order of nationality
- in ascending numerical order of bib number

To change the viewing mode, choose the desired entry using the *View/Order competitors list* function in the menu bar, or just click on the column header you want to order.

The viewing order depends on how the operator is working. If he is referring to the numbers he assigned to the competitors to retrieve them, the View by number mode is strongly advised.

If on the other hand he is referring to the competitors by their last names, the View by name mode is more appropriate.

The viewing mode can be changed at any time and has no influence on how the competition itself is handled.



2.2 Editing competitor information

To edit the complete list of competitors, to change the information on a competitor, or to delete a competitor from the list, use the Edit Competitor Name function under Edit in the menu bar.



In the *Competitors list box* select the competitor to be edited (using the mouse or the arrows) and select the *Edit competitor name...* function (Fig. 3) or the <F7> hotkey.

Fig. 3

The editing window is displayed (Fig. 4).

Note that when this window is displayed, the selection in the *competitors' list box* is still available, i.e. the competitor to be edited can be selected from this *list box*.

All editing is performed from the ID number of the competitor (Number). Editing this *entry field* makes it possible to search directly for a competitor; go to the *entry field* and enter the desired ID number.

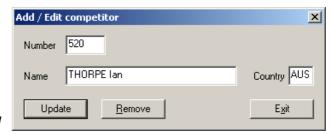


Fig. 4

The program will not allow the same number to be entered twice into the database.

If the number is already assigned in the database, the Name and Country fields are filled out with the information associated with the number. Make the necessary changes and confirm by clicking on the Update button (the competitors *list box* is immediately updated).



If the number does <u>not</u> exist, the Name and Country fields are cleared and the *Update* button is replaced by *Insert+Next*. A new competitor, with the specified ID number, can be added to the database.

Enter the name and nationality in the corresponding fields, and then click on the *Insert+Next* button; the new competitor will be added to the competitors' *list box* which is repositioned for viewing.

When the insertion is confirmed, the program automatically looks for the next free number and displays it in *Number* entry field. This makes editing easy when a series of names must be edited sequentially.

The *tab* key is used to move from one *entry field* to another.

The *Remove* button is used to delete a competitor from the database permanently.

2.3 Editing global values

The *Edit Global Values* function under the *Options* heading in the menu bar opens the editing dialog for global parameters (Fig. 5).

This window has several zones. The Settings files area path allows you to have more than one configuration for swimming event. In example in a 10 lanes swimming pool, you can have images (Start, Results, Summary, Podium and personalized images) for a 10 lanes competition and other images for an 8 lanes competition. Explained with more details, the images are saved in a folder (Generally: C:\\Swiss Timing\Galactica\PRM\ Swimming (this path is the default path)). If you want to more than one configuration available you have to copy the files Swimm.dbe and Swimm.pro in another directory. We strongly advise to create the new folder under the



Fig. 5

...PRM\Swimming folder, because by this way the dropdown list will show you the various folders without displaying the entire path. After having copying both files, select your new folder using the button ... The button allows you to remove a path as well.

To process the event, namely the number of competitors to be processed per page summary (Athletes per summary page) and the number of lanes in the pool (Number of lanes of pool) and the way of Lane numbering in case of 10 lanes competition (Lane numbering) in *General* area and in *Pool settings* area.

Those values are explained as follows: the first in the *Functions - Summary* section and the second in the *Initializing the starting lineup* section.

Note that the number of lanes is generally 8 for an international competition and that the maximum permitted by the program is 10 lanes (1 being the minimum) and that the number of competitors per summary page depends on the size of the scoreboard, but that 8 or 10 are the values used most often.

The value *Autoclear split times after* is used to set the display time for split times and reaction times on board.

Podium image is normally an image with the 4 first swimmers of result list. Every time you press the *Podium* button, one more medalist is displayed on board. By checking the checkbox *"Podium show" in reverse order*, the bronze medalist will be shown first, then the silver one and finally the gold medalist. In case of a tie for the 3rd place, the 4 fields will be used, otherwise just the 3 first ones, the *Swimming Interface* program manages this situation automatically. So you do not have to hide the 4th line manually.

The value *Autoclear split times after* is used to set the display time for split times and reaction times on board.



2.4 Selecting competition to process

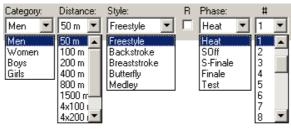


Fig. 6

A competition is characterized by the following:

Sex The sex of the competitors; men or women. The choice of sex on the screen causes the Competitors file currently in memory to be written to the hard disk and the file selected by the sex selection to be read.

Distance (in meters) to be covered. This value can currently be defined between 50 and 1500 meters (standard values defined by the FINA).

Style Style.

Relay If the *dropdown list "Distance*" does not show the relay competition you want to do, Mark the *checkbox*. (In the case of a 4 x 100 m relay, select

100 for distance and mark *checkbox* R).

Phase of competition. The phase includes the swim-off of the series to

be entered in the semifinals (h swim-off) and the swim-off for the semifinals (sf swim-off) to be entered in the finals when it is necessary to

decide between two swimmers with the same time.

Phase number for the heats (1 to 25) and semifinals, nothing (space) if

there is a single final, or A and B if the event provides for finals A (the 8

first) and B (the 8 following).

The choice is made by selecting the entry from each menu that corresponds to the competition to be selected. The mouse or the keyboard can be used for this purpose.

Remember that the <F4> hotkey opens a *dropdown list* when highlighted.

2.5 Editing titles and records

The system allows editing a different title for each competition defined by (Sex, Distance, Style, Relay and Phase).

This title, which will be included in the images (see the corresponding chapter) when they are defined, is made up of two character strings (maximum 40 characters).

For each competition defined by (Sex, Distance, Style, Relay), three different records can be defined. Depending on the type of event, the records to be beaten can be integrated with the images; they can be WR (world record), OR (Olympic record), CR (championship record), etc.



Fig. 7

Note that the records are not updated automatically by the program (they must be made official by the judges). Be careful because every time a new record is made official, you must enter the new value before displaying the image on the scoreboard.



To avoid having to edit a different title for each phase number, the system offers an automatic construction of this number in the title.

The edited text is analyzed searching for the character <#>. If this character is found in the title, it is automatically replaced by the number of the corresponding phase.

Practical example

Title #1: This is the title number ##

Phase #: 16

Constructed title: This is the title number 16

In order to simplify repetitive editing as much as possible, the program memorizes a title in an internal buffer.

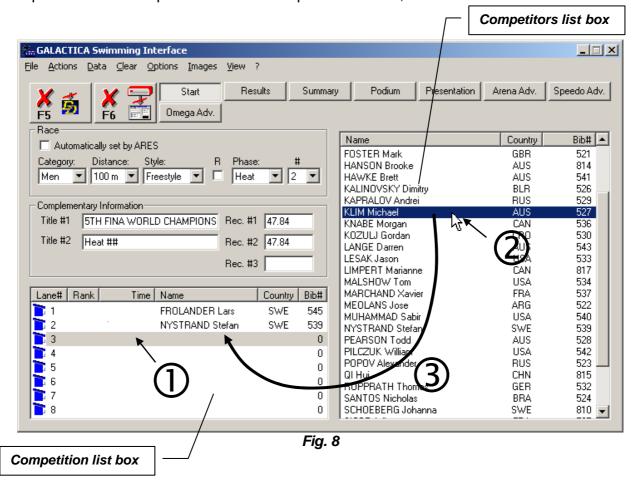
After editing the title (both lines), copy it into the buffer using the Copy title function or (Shift+F7). When you change the phase number, call up this title using the Paste title function (Ctrl+F7) and only change the information that does not correspond.



2.6 Launching the starting line-up

After selecting the competition to be processed and editing the title and records associated with this competition, you can launch the starting lineup itself.

Remember that in theory a competitor must be in the Competitors database in order to be added to a starting lineup. For launching, the competitors must be imported from the Competitors *list box* to put them in the Competition *list box*, in the desired lane.



Steps to take to import a competitor:

① choose the lane in the starting lineup

Highlight the desired line by clicking on it.

2 select the competitor to add

Find the competitor in the Competitors *list box*. Remember that when you type a character in a list box the system does a search and stops on the first element corresponding to the character you entered.

Use one of the View by modes to simplify the search (see the *Editing competitors* chapter).

3 make the insertion in the starting lineup

Double clicking on the left mouse button or pressing the <Enter> key moves the competitor directly into the starting lineup.



After adding a competitor, the system automatically searches for the next lane that has not yet been launched and chooses it in the Competition *list box*. This avoids having to go from one list box to the other and allows the starting lineup to be launched very quickly.

If you select a lane that has already been assigned, the program replaces the existing competitor by the new competitor. This makes it possible to make last-minute corrections easily.

The key re-initializes a lane that was assigned earlier. Highlight the Competition *list* box and press the key on the numerical keypad (note that the time and rank information are lost when a competitor is deleted).

The editing dialog (Edit Competitor Name) can be used when editing the starting lineup to facilitate the search for competitors. As explained in the *Editing competitor information* chapter, typing a number or a name in the corresponding field starts an immediate search in the Competitors *list box*. This can be used to advantage as a search method.

When a list is filled, the program automatically stops searching for a lane. If you try nevertheless to add a competitor, the program will alert the operator that a lane must be selected first, with the following message:

Please select first an entry in the Competition list box!

When the competitor you tried to enter is already in another series, the program alerts the operator with the following message:

Athlete exists in # [number]; do you really want to move it?

Reply Yes if you want to move it from the *number* series and add it to the current series or No if you note that you have made an error and want to abort the current insertion.

It is impossible to insert the same competitor twice in a starting lineup. If you try to do this anyway, the program deletes this competitor from the lane where he was formerly assigned before reassigning him to the selected lane.

The Competition *list box* can be viewed with or without the "rank" and "time" information. Use the *View Competition List with results* function under the *View* heading in the menu bar. Generally, viewing without rank and time is used when editing the starting lineups in order to have an overall view of the name, country, and bib number information in the same lane without having to shift the list box horizontally.



2.7 Serial interface connection

The Serial Interface Settings... function under the Options heading in the menu bar calls up the screen for selecting and assigning the interface. This window checks all COM ports available on the GALACTICA computer and displays them. Restore Defaults button resets the settings to the factory settings.



Fig. 9

The starting parameters must be found in the documentation for the device to be connected; for the physical connection, see the wiring diagrams in the technical documentation.

Sample of default configuration:

	Baud rate:	Word length:	Parity	Stop bit(s)	Handshake:
OSM 6	9600	7	Even	1	None
ARES 21	9600	8	None	1	None

Before each working session, you should test the serial interfaces to make sure everything is working correctly.

The Activate Competition function under the Actions heading in the menu bar becomes active (it is speeded up using the <F6> function key. It is this function that is used to decide whether or not the information coming through the interface must be processed.

In order for a competition to be properly processed, it is necessary after choosing it and initializing the starting lineup, to start processing (<F6> key).



Note: Be sure that competition is activated, before starting competitions otherwise the data sent by the timing equipment (ARES21) will be lost.

The fact that a competition has been activated is indicated visually by the background color of the Competition *list box* that changes from white to blue (Fig. 1).

When a competition has been activated, the operator theoretically has nothing more to do until it is over. The timing equipment will send the times and delete them after a fixed delay (see §2.3 Editing global values, value "Autoclear split times after") until the competition is over.

At the end of the processing of the competition, when all the times are in, the competition can be deactivated, still using the <F6> key. The background of the Competition *list box* changes from blue to white.

2.8 Editing the results

At the end of a competition, a jury meets to settle close contests.

A swimmer can be disqualified, which means that the operator must replace manually the results received from the timer; the results editor helps make these changes.

Call up the Edit Results function (accelerated by using the F8 function key) under the Edit heading in the menu bar (Fig. 10).

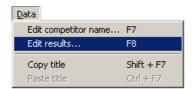


Fig. 10

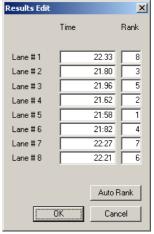


Fig. 11

The results editing dialog appears on the screen (Fig. 11). For each lane it displays the time and the rank received by the timer.

The operator can change these values at will.



Note that the rank is not updated automatically; if the operator changes a time which will result in a change in the rank, he must change the rank as well. *Auto Rank* button compute the correct ranking for the new times.



2.9 Generated images and functions

The primary purpose of the Swimming program is to generate images for the display interface; the latter permits generating six different images suited to the various phases of a competition.



Fig. 12

The **Image selector** bar (Fig. 12) contains 4 fix buttons and 10 optional personalized buttons, each assigned to a display. Clicking on one of these buttons prepares the corresponding display, which then appears on the screen if *View Actual Image < F9 >* is checked in View menu.

The predefined images are in order:

Start used to display the starting lineups before a competition begins.

Results used after the results have been officially accepted by the jury to show

the ranking for the race.

Summary used when a complete phase is ended to display the ranking of the

swimmers that generally corresponds to the composition of the following

phase.

Podium used to follow the victory ceremony.

The 10 optional images could be used by the operator to show the logo for the competition, the swimmer's presentation advertising, a sponsor, etc.



2.9.1 Sending an image to the Display Director

The generated image can be sent at any time to the Display Director (DD), which sends it to the scoreboard.

The DD must request the connection (Get from Maker..., Swimming).

When the DD is connected, the function key $(\langle F5 \rangle)$ in the *functions* part of the *Image* selector (Fig. 12) controls the information to be sent to the scoreboard, and when it is sent.

The color of the button shows immediately what mode the program is in:

Red Image preparation mode. The program does not transmit the image to

the DD.

Green *Direct mode.* Any change in the image is transmitted to the DD.

Each time the operator changes the image the program enters the *preparation mode*. The operator can view the new image that has been generated and if it is the correct one, he can send it using the send button (F5).

2.9.2 Images management

In the *Images* menu, all features to manage the images are provided. The *Insert* command will ask you to enter a name for the new image and then it will start the *Image Editor (IMED)*. The **Edit** popup menu allows you to edit one of the existing images by starting the *IMED* with the selected image. The **Rename** command allows you to change the name of an image. The **Change order** command can help sorting the images in the *images selector bar*. The *Import* command is really useful if you want to have two similar images. For example a results image has to have the same look (title, name position, rank fields instead of lane fields, etc...) as a start list image.

The easiest way to do that is to use the **Import** function. To prepare this "MY RESULTS" image, select **Import** in the **Images** menu: the **Import** a Galactica image file window opens; then you must select SW_START LIST.IGF (note that all user defined button images are saved with a name SW_Custom_XX where XX is a 0 based index of the button position). This will add a new button called "Start list". Launch the **Rename** function and rename the last image as "MY RESULTS". Then you can edit the "MY RESULTS" image using the **Edit** function, and with the IMED, delete LANE field 2 to 8 (or 10) change the database reference to RANK for the 1st LANE field and duplicate it 7 (or 9) times. By this way all the other fields like swimmers' name, time, etc..., stay at the same place, and there is no field shifting when you change from an image to the other.

The **Remove** function removes an image in the image list and its associated button in the *images selector bar*. By security, a copy of the image which has been deleted is saved with the file extension .~gf in the current sport folder.



Note

If, by accident, you delete an image and want to restore it, you can do it by using the **Import** function and by changing the type in the *Import a Galactica image file* window to Galactica Old Custom Files (*.~gf). The deleted images will be displayed.

Note that if you delete twice the same "button", only the last one will have been saved

The function *Transition effect for image* ▶, in the *Images* menu, lets you to define the transition effect that will be used when the image is selected. The result of the effect will only be shown on *View online* in Display Director (DD) when F5 is activate, and the Swimming is selected in the DD. Detail and explanation about effect could be found in DD user manual.

2.10 Functions and images: use

When one of the functions is selected, the program automatically generates the corresponding image. If the function View Actual Image <F9> is selected, the image is displayed on the screen in the view window but in any case it is generated in memory so that the *Display Director* can use it.

The Start list image is generally composed of a title including the competition with its phase number and records to beat, followed by the list of swimmers in lane order.



START Image

The Result image uses the same principle as the Start image but displays the information on the competitors in the order sorted by results obtained.

In the example the information on the swimmer who had the best time is displayed in black on white to make it stand out.



RESULT Image



The Summary image, which is displayed when a phase is completed, shows the ranking of all the swimmers who were in this phase.

Note that the image displayed corresponds to the beginning of the list, in other words page 1 of the Summary.

The Summary button displays the number of summary pages.

Clicking on the *Summary* button once again generates the following page.

5TH FINA WORLD CH	IAMPIOI	NSHIPS	
SUMMARY Men	50m Fre	estyle	
1 FOSTER Mark 2 NYSTRAND Stefan 3 HAWKE Brett 4 BUSQUETS Ricardo 5 MUHAMMAD Sabir 6 PILCZUK William 7 LANGE Darren 8 DEDEKIND Brendon	GBR SWE AUS PUR USA USA AUS RSA	21.43 21.86 21.91 21.95 22.10 22.14 22.20 22.21	
Timing & Data Handling by Ω OMEGA			

Summary Image



Remember that the number of swimmers per page is defined in the global variables of the program (see the *Editing global values* section). This number must correspond to the number of swimmers who will be defined in the Summary image.

If the Display Director is connected, for each page generation and after viewing it to check on the content, send the image using the ∢F5≯ key.

The podium image calls up the information from the result list but displays only the top three.

After the image has been constructed, be sure to display at least the top four, in case of a tie.

This function makes it easy to follow the victory ceremony.

We recommend preparing the *Podium* image with the 4 first swimmer of Result list. The *Swimming Interface* software manages automatically the tie case for the 3rd place and displays the 4th line of result otherwise only the 3 first ones are shown.



PODIUM Image

3311.545.02 Version 1.4 Page 15



Button text	Normal mode	Reverse mode	
Podium 0	Image without result	Image without result	
Podium 1	Image with gold medalist	Image with bronze medalist	
Podium 2	Image with gold and silver medalists	Image with silver and bronze medal-lists	
Podium 3	Image with gold, silver and bronze medalists	Image with gold, silver and bronze medalists	
Podium 4	Image with the four medalists in case of a tie for the 3 rd place.	Image with the four medalists in case of a tie for the 3 rd place.	

By this way, when the awards are announced, the operator can switch from one to the other image to display the one with the next name and as it is announced.



2.10.1 Swimmer's presentation

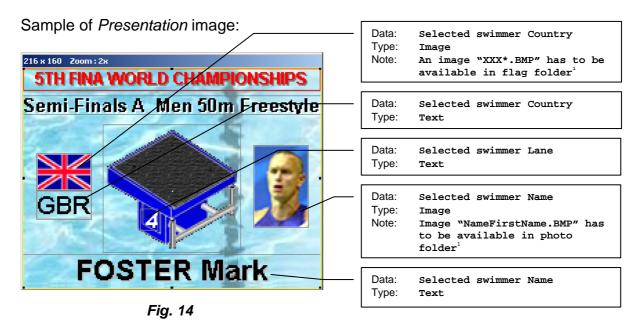
A special feature allows the operator to follow the swimmer's presentation. The following fields of the database are automatically updated when the operator's selection in *Competition list box* change:

Selected swimmer Lane Selected swimmer Name Selected swimmer Country Selected swimmer Rank Selected swimmer Result

In figure 13, a sample of presentation using *Lane, Name* and *Country* of *Selected swimmer* fields is shown. When the announcer presents the swimmer, the operator click on the swimmer's line and the lane, name, country, flag and picture change. The flag is selected using the Country code with type *Image*, and the picture is selected using the name set with type *Image*. For more details about building a presentation image, please see the attached documentation *Image Editor User Manual* on § 1.4).



Fig. 13



1: To set the photo and flag folders, select the *General Settings...* in *Options* menu in the *Image Editor (IMED)* program.



3 Competition managed by the ARES

3.1 Settings on Swimming program

The Swimming Interface program could work automatically when it is connected to the ARES 21. Automatically means: "React on command received from the ARES". That means that when the ARES sends a *start list*, the program selects by itself the *Start* image and fills the database entries. ARES Swimming program allows controlling *Start*, *Results*, and *Summary* images. To use this feature, check the checkbox called "Automatically set by ARES" (Fig. 15).

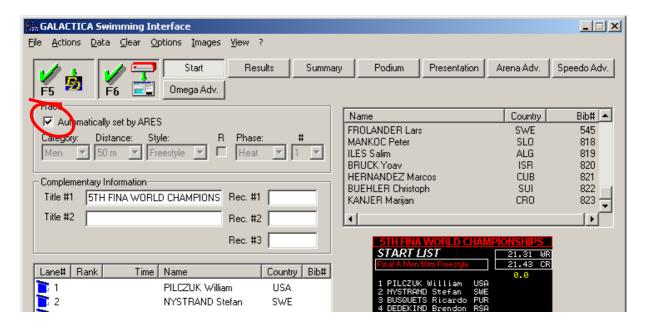


Fig. 15

Note that the *Competitor list box* and the *Race information* are disabled in this mode because the Ares send titles, records and Swimmers' information.

3.2 ARES21 Swimming program: How to do?

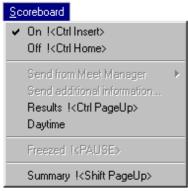


Fig. 16

The ARES 21 Swimming program has to be set with the scoreboard settings: *GALACTICA – Direct 3000*. In this mode it is possible to set a maximum length for the name send to the GALACTICA Swimming interface. The ARES21 Swimming program splits automatically the name and adds the first letter of the first name in case of longer name.

To manage the scoreboard from the ARES21 Swimming program, the timekeeper has just to select *On*, *Results*, and *Summary* in Scoreboard menu to send respectively the start list, the results, and the summary (Fig. 16). We recommend learning the shortcut keys to be faster during the competition.