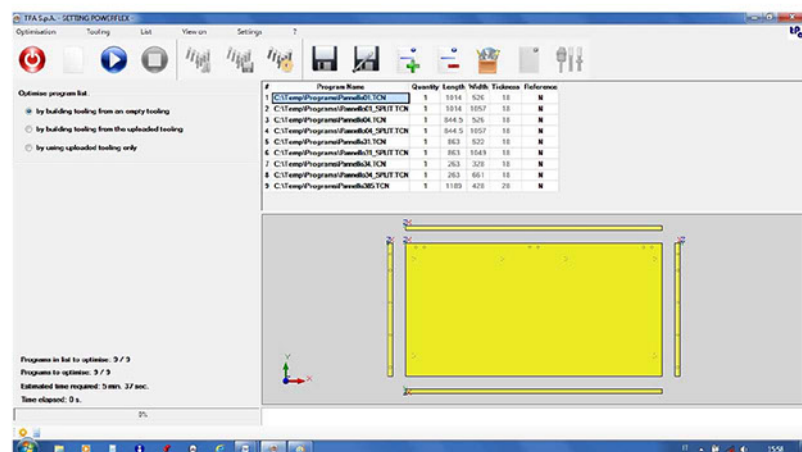
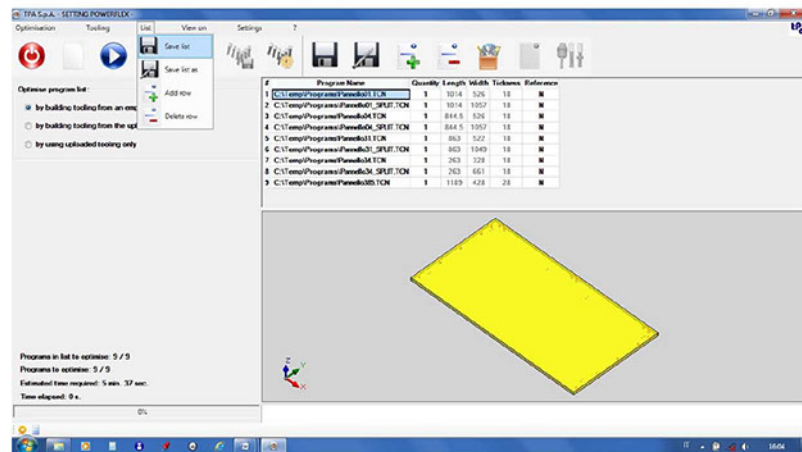




Setting

GENERAL FEATURES

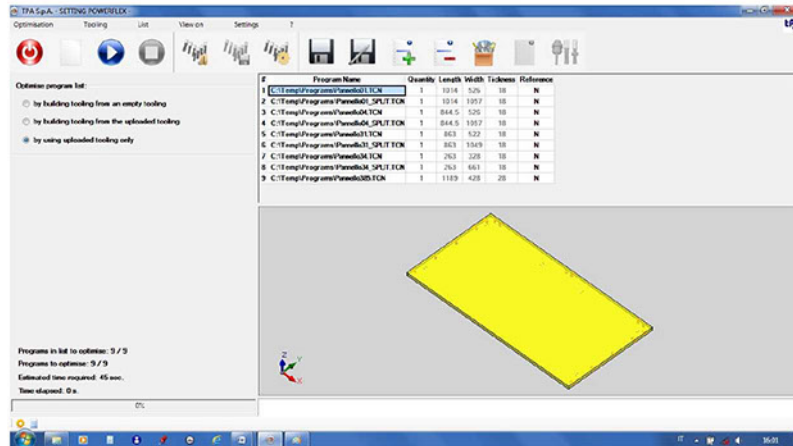
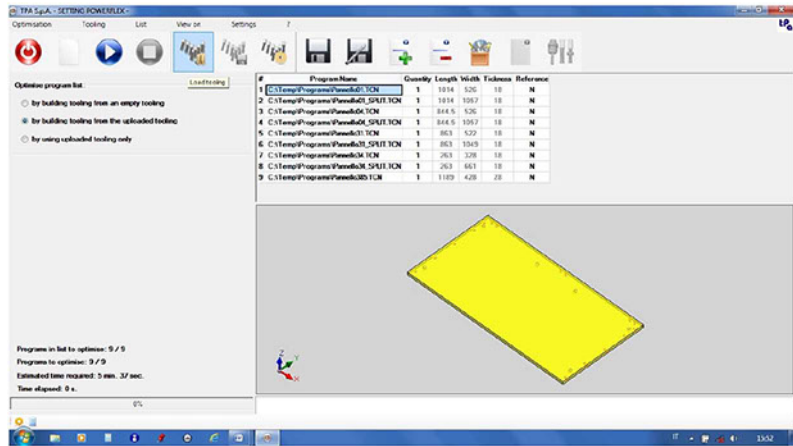
A widespread problem on machines dedicated to drilling and insertion of ironmongery on panels consists in the necessity to dispose of the best configuration of tooling of the operating heads, in order to reduce as much as possible the working time and to ensure a greater production efficiency. "Setting" allows you to properly equip the spindles on the operating heads of single machines or plant so that all pieces planned during processing can be performed by choosing to take the least number of possible strokes, the smaller number of replacement bits and the fewest execution time, by aggregating the largest number of bits to each lowered and ensuring rational distribution of workload in the case of a line of several machines.



FUNCTIONAL CHARACTERISTICS

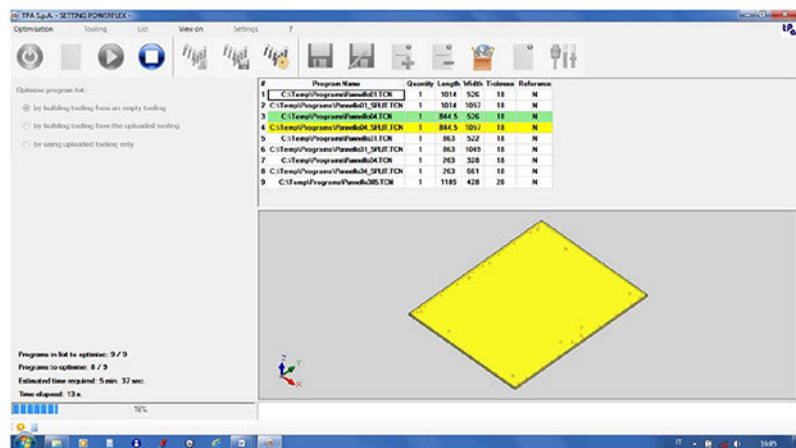
List of programs Creation

The creation of a list of programs that has to be optimized can be achieved by loading one or more TpaEdi file (file with extension. TCN) or by uploading a file to the file list TpaEdi for Setting, already filled. The created list can be edited and saved.



Selecting the type of optimization of tooling

The optimization of tooling to perform a list of programs can be performed starting from a vacuum tooling, from an initial tooling that has to be completed or from a complete and not modifiable tooling.



Starting the optimization process

The optimization of tooling starts analyzing every single program that is in the list, defining for all groups of each machine the optimum arrangement of the bits to run each program in the fewest number of strokes and time as possible.

It's possible to observe how the panel will be done through the 2D simulation program that allows you to see the layout of groups and the holes drilled in every bar.

#	Tool name	Type	Diameter	Total length	Usable length	Drill head length	Countersink length	Countersink diam.	Rotation	Quantity	Description
1	10_0_NORM_EX	1	10	51	42	0	6	10	CW	6	**
2	10_0_NORM_SX	1	10	51	42	0	6	10	CCW	7	**
3	10_0_SX_Svramata_20	3	10	51	22	0	3	16	CCW	12	**
4	10_0_EX_Svramata_20	3	10	51	22	0	3	16	CW	16	**
5	25_0_BLITZ_EX	9	10	51	39	0	11	25	CW	2	**
6	25_0_BLITZ_SX	9	10	51	39	0	11	25	CCW	2	**
7	12_0_NORM_EX	1	12	51	42	0	6	10	CCW	38	**
8	12_0_NORM_SX	1	12	51	42	0	6	10	CW	12	**
9	16_0_NORM_EX	1	16	51	42	0	6	10	CW	7	**
10	16_0_NORM_SX	1	16	51	42	0	6	10	CCW	15	**

Initial loading file: C:\TEMP\PREVIOUSSETTING.ATR
Drills to set number: 90
Drills to remove number: 121

Final loading file: C:\TEMP\CURRENTSETTING.ATR

Mac-ID	Tool name	Type	Diameter	Total length	Usable length	Drill head length	Countersink length	Countersink diam.	Rotation	Quantity	Description
1-102	25_0_BLITZ_EX	9	10	51	39	0	11	25	CW	1	**
1-105	XXXXXXXX										
1-106	XXXXXXXX										
1-109	XXXXXXXX										
1-110	XXXXXXXX										
1-113	25_0_BLITZ_SX	9	10	51	39	0	11	25	CCW	1	**
1-115	XXXXXXXX										
1-117	XXXXXXXX										
1-118	XXXXXXXX										
1-120	XXXXXXXX										
1-124	XXXXXXXX										
1-125	XXXXXXXX										
1-127	XXXXXXXX										
1-128	XXXXXXXX										
1-152	10_0_EX_Svramata_20	3	10	51	22	0	3	16	CW	1	**
1-153	10_0_SX_Svramata_20	3	10	51	22	0	3	16	CCW	1	**
1-154	10_0_EX_Svramata_20	3	10	51	22	0	3	16	CW	1	**
1-155	XXXXXXXX										
1-156	10_0_EX_Svramata_20	3	10	51	22	0	3	16	CW	1	**
1-157	XXXXXXXX										
1-158	10_0_EX_Svramata_20	3	10	51	22	0	3	16	CW	1	**
1-160	10_0_EX_Svramata_20	3	10	51	22	0	3	16	CW	1	**
1-162	10_0_EX_Svramata_20	3	10	51	22	0	3	16	CW	1	**
1-164	10_0_EX_Svramata_20	3	10	51	22	0	3	16	CW	1	**
1-165	XXXXXXXX										
1-166	XXXXXXXX										

A list of the types and amount of bits needed to complete the tooling required to run the program list is provided. This list can be saved and printed.

Two types of tooling can be compared, in order to know how many and which bits need to be replaced on the machine.