



# SHOTPlus™

SHOTPlus Standard  
Initiation Design with Exel™

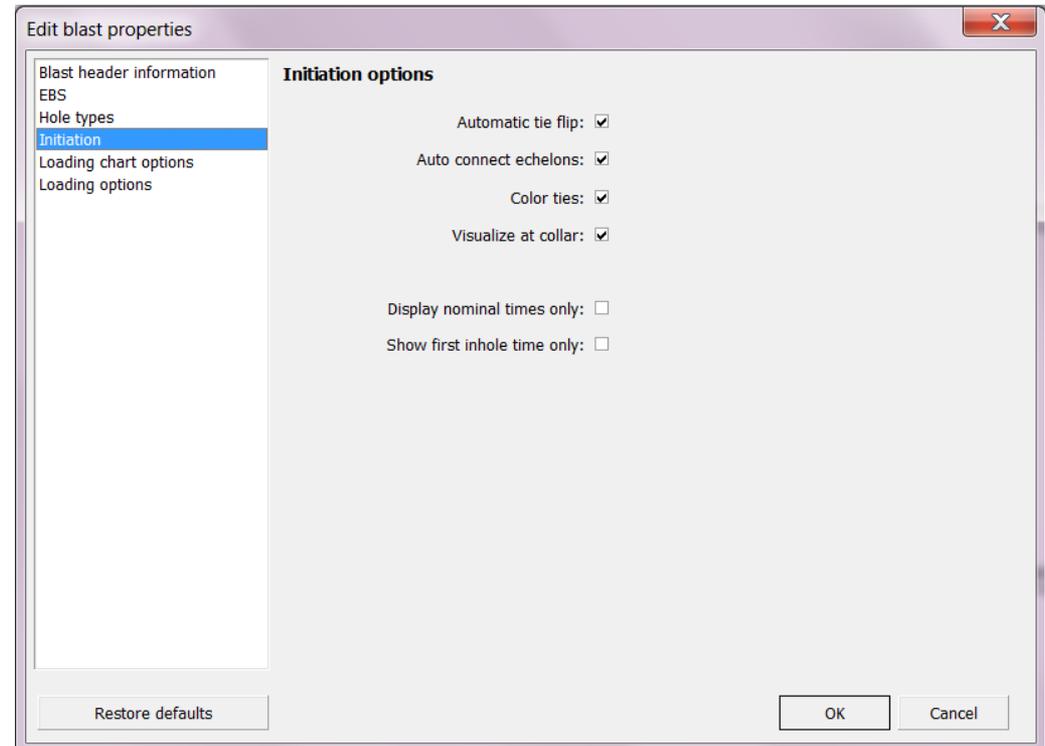
March 2017



# SET-UP OPTIONS

Users can define initiation properties in **Blast Properties**

- Automatic tie flip
- Auto connect echelon
- Colour ties
- Visualise at Collar
- Display nominal times only
- Show first inhole time only



- Search radius to help hook-up of non-aligned rows



- Initiation tool icons



Add lead-in  
(Initiation Point)

Tie Tool  
(opens connector  
palette)

Dummy hole tool  
(makes extra  
connection  
points)

Inhole delay tool  
(loads delay  
products to holes)

# GENERAL

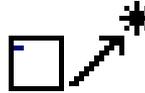
- Tie Palette

The image shows a software interface for configuring a 'Tie Palette'. At the top, there is a toolbar labeled 'IS palette' with several icons and buttons. Callouts point to specific features:

- Add a product**: Points to the 'Product' button (a plus sign) in the toolbar.
- Add a dummy hole**: Points to the 'Add' button (a plus sign with a dashed line) in the toolbar.
- Specify tie behaviour**: Points to the 'Automatic tie-up' and 'Connect multiple holes' checkboxes on the right side of the toolbar.
- Product selection**: Points to the 'Select surface IS device' dialog box, which is open and shows a list of device types (Signal tube, Detonating cord delay, Detonating cord, Electric, Harness wire, EBS detonators, User defined delay) and a 'Product selection' section with a dropdown for 'Exel Connectadet' and a 'Delay' dropdown for '009 (9)'. The dialog has 'OK' and 'Cancel' buttons at the bottom.

The main interface also shows a grid of hole locations labeled with IDs and depths, such as B1 (21.2m), B2 (21.2m), A1 (21.2m), A2 (21.2m), and A3 (21.2m). A legend indicates 'HoleID' and 'Depth'.

# GENERAL

- Applying ties – Point to Point 
- Applying ties – Row tie 



# IN-HOLE DELAY TOOL

- This tool is used to apply delay series detonators



Qty  
#1

Inhole det loading

Detonator type: Exel MS (Millisecond det)

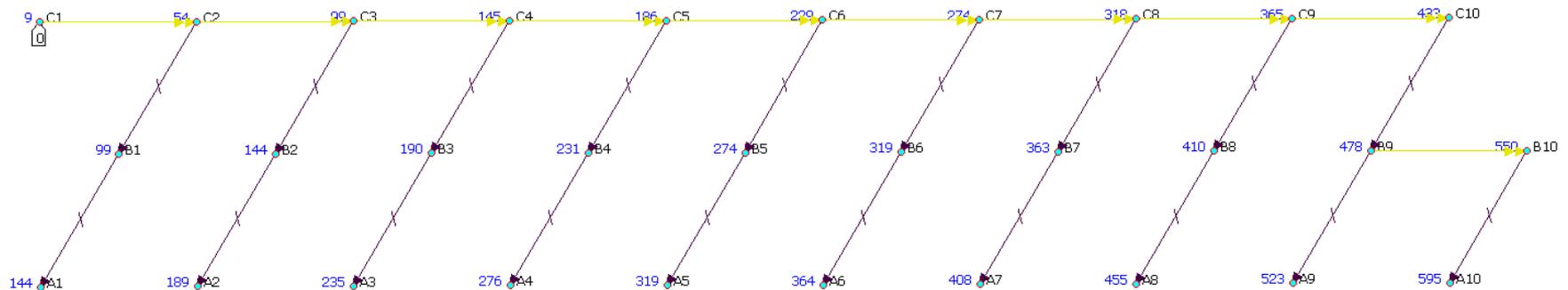
Booster: No booster

#	Delay	Qty	%
0	0	1	3.3
1	25	3	10.0
2	50	3	10.0
3	75	3	10.0
4	100	3	10.0
5	125	3	10.0
6	150	3	10.0
7	175	3	10.0
8	200	3	10.0
8.5	225	0	0.0
9	250	3	10.0
9.5	275	0	0.0
10	300	2	6.7
10.5	325	0	0.0
11	350	0	0.0
11.5	375	0	0.0
12	400	0	0.0
12.5	425	0	0.0
13	450	0	0.0

Use Page Up/Down to change delay

# APPLYING HOOK-UPS

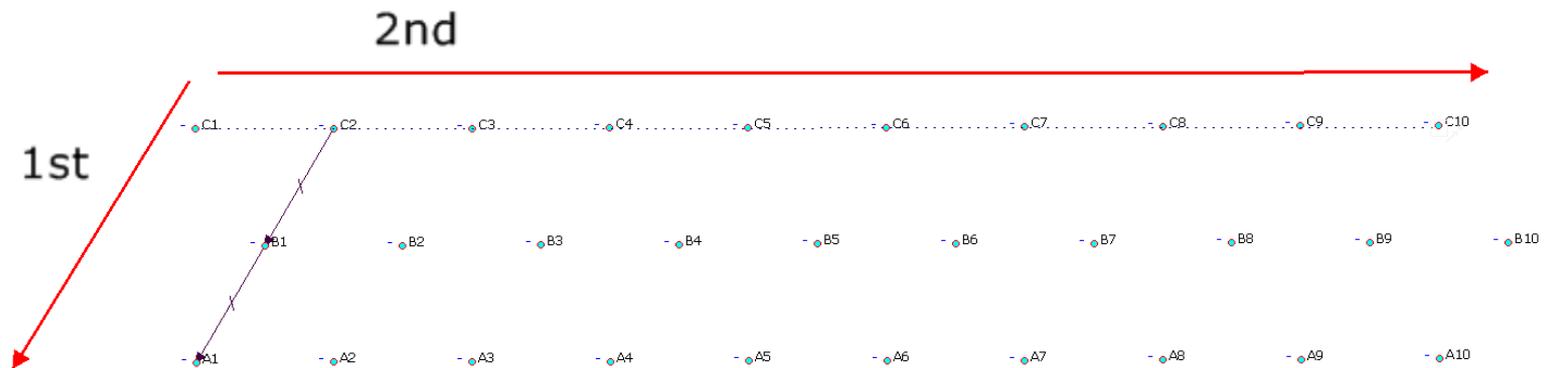
- Holes must be loaded with detonators
- A hook-up must apply at each blasthole collar
- An initiation point (lead-in) must be applied



# APPLYING HOOK-UPS

## Auto Hook-up

1. 1<sup>st</sup> - Apply echelon tie
2. 2<sup>nd</sup> - Apply control row
3. Hook-up will automatically fill out on a regular pattern



# HOOK-UP TRICKS

- Use dummy holes to manage connection points away from blasthole collars
- User defined delays offer flexibility for complex situations

