
> Superflat LED pilot lights and pilot light modules (clusters)
> Very long service life (half life of $100^{\circ} 000$ hours= 11 years)
> Easiest „click-in" fixing by patent-protected click-in device for panel thicknesses of 1-4 mm
> Bright and even illumination, wide visibility angle
> Several available colours for the ill. screens, including bi-colour
> Service voltages from 12 V DC to 230 VAC
> Frame made of high impact strength „DELRIN"
> Prime quality, assembled in Switzerland. Each and every unit undergoes a function check before leaving the factory

|  | Art.-No. | Dimensi | (mm) | Pane | Mounting | Available | Standar | Connect. |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Frontframe | Illumin. screen(s) | cut-out | depth | colours for the ill. screens | voltages |  |  |
| 은 응 흥 응 | $\square$ <br> WSF10-00.a) R..b)dc | 18x24 | 10x10 | $\begin{aligned} & 16 \times 22 \\ & +/-0,1 \end{aligned}$ | 12,9 | - 1 = red <br> 2 = yellow <br> - 3 = green <br> - 4 = orange <br> - 6 = blue <br> $\square 7=$ white $8=$ redgreen ${ }^{\dagger}$ <br> 9 red <br> yellow ${ }^{\dagger}$ <br> ${ }^{\dagger}$ bicolor | $\begin{aligned} & \stackrel{\rightharpoonup}{\otimes} \\ & \stackrel{\rightharpoonup}{0} \\ & \stackrel{\rightharpoonup}{0} \end{aligned}$ |  |  |
| بـه | WSF15-00.a) R..b)dc | $24 \times 24$ | 15x15 | $\begin{aligned} & 22 \times 22 \\ & +/-0,1 \end{aligned}$ | 14,9 | $\begin{aligned} -1 & =\text { red } \\ 2 & =\text { yellow } \\ -3 & =\text { green } \\ -4 & =\text { orange } \end{aligned}$ |  |  |  |
| 을 응 흥 응 | $\square$ <br> WSF10-0...a) R..b)dc | $18 \times 36$ | 2 illumin. screens 10x10mm | $\begin{aligned} & 16 \times 34 \\ & +/-0,1 \end{aligned}$ | 12,9 | 1 = red <br> 2 = yellow <br> - 3 = green <br> 4 = orange <br> 6 = blue <br> $\square 7=$ white <br> $8=$ redgreen ${ }^{\dagger}$ <br> -9 red <br> yellow ${ }^{\dagger}$ <br> ${ }^{\dagger}$ bicolor |  |  |  |
| 믈 | WSF15-0...a) R..b)dc | $24 \times 48$ | 2 illumin. screens 15x15mm | $\begin{aligned} & 22 \times 46 \\ & +/-0,1 \end{aligned}$ | 14,9 | $\begin{aligned} ■ 1 & =\text { red } \\ 2 & =\text { yellow } \\ ■ 3 & =\text { green } \\ -4 & =\text { orange } \end{aligned}$ | $\begin{aligned} & \bar{\sigma} \\ & 0 \\ & \underset{O}{\sim} \\ & \underset{\sim}{n} \end{aligned}$ |  |  |

${ }^{\text {a) }}$ : Colour of the ill. screen(s) according to the codes in the appropriate column
${ }^{\text {b) }}$ : Voltage „12" or „24"
Ordering example: WSF10-001 R24: LED pilot light Flasi ${ }^{\circledR}$ series $18 \times 24 \mathrm{~mm}$ with ill. screen $10 \times 10 \mathrm{~mm}$ red, 24 V DC Lettering possible (screen printing); Minimum quantity: 100 pieces
Accessory: WSF220/12F Voltage divider for connecting Flasi ${ }^{\circledR}$ single or twin LED pilot lights with a service voltage of 12 V DC to a 230 V AC power source. (1 voltage divider per ill. screen). Dimensions: $\varnothing 28 \times 36,5 \mathrm{~mm}$.

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- LED-pilot light modules $48 \times 48 \mathrm{~mm}$ with $1-3$ illuminated screens $10 \times 10 \mathrm{~mm}$ and adjacent title blocks (Screen printing is offered as separate service at extra charge).
- For service voltages of 12 V DC to 115 V DC and 115 V AC as well as 230 VAC .
- Available colours for the ill. screens: $\square$ red, yellow, $\square$ green, $\square$ orange, $\square$ blue, $\square$ white, as well as bi-color red-green and red-yellow (bi-colour executions for voltages from 12 V DC to 60 DC only
- Free combination of the colours and numbers of the illuminated screens.
- Several special executions available like screw-on terminals, AC-executions of the low voltage versions etc. (see below)
- Faston connectors $2,8 \times 0,8 \mathrm{~mm}$ (standard).
- Panel-cut-out: $45 \times 45 \mathrm{~mm}+/-0,1$

| Art.-No. | Standard voltages | Description | Mounting depth | Diagram |
| :---: | :---: | :---: | :---: | :---: |
| WSF810... ${ }^{\text {a }}$ R... ${ }^{\text {b) }}$ | $\begin{aligned} & 12 / 24 / 36 / 48 / 60 \mathrm{VDC} \\ & 115 \mathrm{~V} \text { DC } \\ & 115 \text { V AC } \\ & 230 \text { V AC } \end{aligned}$ | Standard execution with common OV (-) connector | $12-36$ V DC: $10,4 \mathrm{~mm}$ <br> 48 V DC: $12,4 \mathrm{~mm}$ <br> 60 V DC: $12,4 \mathrm{~mm}$ <br> 110 V DC: $18,7 \mathrm{~mm}$ <br> 115/230 V AC: 21 mm  |  |
| WSF142... ${ }^{\text {a) }}$ R... ${ }^{\text {b) }}$ | $\begin{aligned} & \text { 12/24/36/48/60 VDC } \\ & 115 \text { V DC } \end{aligned}$ | With separate connector for lamp test | $\begin{array}{ll} 12-48 \text { V DC: } & 10,4 \mathrm{~mm} \\ 60 \text { V DC: } & 12,4 \mathrm{~mm} \\ 110 \text { VC: } & 18,7 \mathrm{~mm} \end{array}$ |  |
| WSF143... ${ }^{\text {a }}$ R... ${ }^{\text {b) }}$ |  | Pushbutton module no illuminated screens. Colour code in art.-no. is for push button cap | 10,4 mm |  |
| WSF144... ${ }^{\text {a }}$ R... ${ }^{\text {b) }}$ | $\begin{aligned} & \text { 12/24/36/48/60 VDC } \\ & 115 \text { V DC } \end{aligned}$ | LED-cluster with 2 illuminated screens and 1 push-button instead of screen no. 3 | same as WSF142 |  |
| WSF821... ${ }^{\text {a }}$ R... ${ }^{\text {b) }}$ | $\begin{aligned} & \text { 12/24/36/48/60 VDC } \\ & 115 \text { V DC } \end{aligned}$ | Special execution with connector for feedback to the control unit. | same asWSF142 |  |
| WSF822... ${ }^{\text {a }}$ R... ${ }^{\text {b) }}$ | $\begin{aligned} & \text { 12/24/36/48/60 VDC } \\ & 115 \text { V DC } \end{aligned}$ | Special execution with common Plus (+) OV connector and separate negative (-) connectors | same as WSF142 |  |
| WSF826... ${ }^{\text {a }}$ R... ${ }^{\text {b) }}$ | 12/24/36/48/60 VDC | Special executions with add. connectors for lamp test and feedback to control unit | $\begin{aligned} & 12-48 \text { V DC: } 10,4 \mathrm{~mm} \\ & 60 \text { V DC: } \end{aligned}$ |  |
| WSF824... ${ }^{\text {a) }}$ R... ${ }^{\text {b) }}$ | $\begin{aligned} & 12 / 24 / 36 / 48 / 60 \mathrm{VDC} \\ & 115 \mathrm{~V} \text { DC } \end{aligned}$ | Special execution with individual connectors (6 connectors for 3 ill. screens) | same as WSF142 |  |

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- LED pilot light modules $72 \times 72 \mathrm{~mm}$ with 1-3 ill. screens $15 \times 15 \mathrm{~mm}$ and adjacent title blocks (Screen printing is offered as separate service at extra charge).
- Available colours for the ill. screens: $\square$ red, yellow, green, orange, $\square$ blue, $\square$ white
- For service voltages of 12 V DC up to 115 V DC and 115 V AC as well as 230 VAC .
- Free combination of the colours and the number of the illuminated screens
- Faston connectors $2,8 \times 0,8 \mathrm{~mm}$, Screw-on terminals available at extra cost.
- Panel cut-out: $67 \times 67 \mathrm{~mm}+0 /-0,5$

| Art.-No. | Standard voltage(s) | Description | Mounting depth | Diagram |
| :---: | :---: | :---: | :---: | :---: |
| WSF815... ${ }^{\text {a }}$ R... ${ }^{\text {b) }}$ | $\begin{aligned} & 12 / 24 / 36 / 48 / 60 \mathrm{VDC} \\ & 115 \mathrm{~V} \text { DC } \\ & 115 \mathrm{VAC} \\ & 230 \text { V AC } \end{aligned}$ | Standard execution with common OV (-) connector | $12-48$ V DC: 14 mm <br> 60 V DC: 21 mm <br> 110 V DC: 21 mm <br> $115 / 230 \mathrm{~V} \mathrm{AC:}$ 21 mm | $\begin{array}{ll} \cdots \infty \\ +\infty & \square \\ +\infty \\ +\infty & \square \\ +\infty \\ \hline \end{array}$ |
| WSF145... ${ }^{\text {a) }}$ R... ${ }^{\text {b) }}$ | $\begin{aligned} & 12 / 24 / 36 / 48 / 60 \mathrm{VDC} \\ & 115 \mathrm{~V} \text { DC } \end{aligned}$ | Special execution with individual connectors (6 connectors for 3 ill. screens) | same as WSF815 |  |
| $\begin{aligned} & \text { WSF815B... }{ }^{\text {a) }} \\ & \text { R...b) } \end{aligned}$ | $\begin{aligned} & 12 / 24 / 36 / 48 / 60 \mathrm{VDC} \\ & 115 \mathrm{~V} \text { DC } \\ & 115 \text { V AC } \\ & 230 \text { V AC } \end{aligned}$ | Special execution with separate connectors and individual voltages for each ill. screen (DC and/or AC!) | ```12-48 V DC: 10,4 mm 60 V DC: 110 V DC: 18,7 mm 115/230 V AC: }21\textrm{mm``` |  |

a): Available colour(s) of the ill. screens : $0=$ blank, $1=■$ red, $2=\square$ yellow, $3=\llbracket$ green, $4=\square$ orange, $6=\square$ blue, $7=\square$ white
${ }^{\text {b) }}$ : Service voltage, e.g. 12VDC or 230VAC, other voltages upon request
Accessories (for 䍖 LED pilot light clusters $48 \times 48 \mathrm{~mm}$ and $72 \times 72 \mathrm{~mm}$ ):

| Art.-No. | Description |  |
| :--- | :--- | :--- | :--- |
| WSF94-240/125 | Resistor module for connecting 115 V DC LED pilot light clusters to a <br> power source of 230 V DC. |  |
| WSF05-400/12 | Transformer module for connecting 12 V DC LED pilot light clusters to <br> a power source of 380/400 V AC. One transformer module is needed <br> for each illuminated screen. |  |



- LED-pilot light modules $48 \times 48 \mathrm{~mm}$ with $4-6$ illuminated screens $10 \times 10 \mathrm{~mm}$ and adjacent title blocks (Screen printing is offered as a separate service at extra charge - sequence according to the illustration).
- Available colours for the illuminated screens: $\square$ red, yellow, $\square$ green, $\llbracket$ orange, $\llbracket$ blue, $\square$ white
- For service voltages of 12 V DC up to 60 V DC and 115 V AC as well as 230 VAC .
- Free combination of the colours and the number of the illuminated screens.
- Faston connectors $2,8 \times 0,8 \mathrm{~mm}$.
- Panel cut-out: $45 \times 45 \mathrm{~mm}+/-0,1$

| Art.-No. | Standard voltages | Description | Mounting depth |
| :---: | :---: | :---: | :---: |
| WSF910A ..... ${ }^{\text {a }}$ R. ${ }^{\text {b) }}$ | $\begin{aligned} & 12 / 24 / 36 / 48 / 60 \mathrm{~V} \\ & \mathrm{DC} \end{aligned}$ | LED pilot light module (cluster) with 4 to 6 illuminated screens $10 \times 10 \mathrm{~mm}$ with common OV (-) connector for service voltages from 12 V DC up to 60 V DC. | $12-36$ V DC: $10,4 \mathrm{~mm}$ <br> 48 V DC: $12,4 \mathrm{~mm}$ <br> 60 V DC: $12,7 \mathrm{~mm}$ <br> $115 / 230 \mathrm{VAC}: 21 \mathrm{~mm}$  |
| WSF910B ...... ${ }^{\text {a }}$ R. ${ }^{\text {b) }}$ | $\begin{aligned} & 12 / 24 / 36 / 48 / 60 \mathrm{~V} \\ & \mathrm{DC} \end{aligned}$ | LED pilot light module (cluster) with 4 to 6 illuminated screens $10 \times 10 \mathrm{~mm}$ with separate connectors for each ill. screen for service voltages from 12 V DC up to 60 V DC . | $12-36$ V DC: $10,4 \mathrm{~mm}$ <br> 48 V DC: $12,4 \mathrm{~mm}$ <br> 60 V DC: $12,4 \mathrm{~mm}$ <br> $115 / 230 \mathrm{VAC}: 21 \mathrm{~mm}$  |
| WSF911 ..... ${ }^{\text {a) }}$ R... ${ }^{\text {b) }}$ | 115 \& 230 V AC | LED pilot light module (cluster) with 4 to 6 illuminated screens $10 \times 10 \mathrm{~mm}$ with common OV connector for service voltages of 115 V AC or to 230 V AC. | $115 \mathrm{~V} \mathrm{AC}: 41 \mathrm{~mm}$ 230 V AC: 41 mm |

${ }^{\text {a) }}$ : Available colour(s) of the ill. screens: $0=$ blank, $1=\square$ red, $2=\square$ yellow, $3=\square$ green, $4=\square$ orange, $6=\square$ blue, $7=\square$ white Sequence of the ill. screens according to the illustration on top of this page
${ }^{\text {b) }}$ : Voltage, e.g. 12VDC or 230VAC, other voltages upon request
Ordering example: WSF910A 130062 R24dc = LED pilot light module $48 \times 48 \mathrm{~mm}$ with common 0 V connector and 6 illuminated screens $10 \times 10 \mathrm{~mm}$ (of which 4 are used), red / green / blank / blank / blue / yellow, 24 V DC.


Lettering according to information supplied by customer (max. 7 letters), screen printing will be charged separately.


|  |  | Art．－No． | Dimensions（mm） |  | Panel cut－out | Mount． depth | Available colours of the ill． <br> screens | Standard voltage | Connect． |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Front frame | Illumin． screen |  |  |  |  |  |  |
| $\begin{aligned} & \text { g } \\ & \text { C } \\ & \vdots \\ & \vdots \\ & \infty \\ & \infty \end{aligned}$ |  |  | 18×24 | 10x10 | $\begin{aligned} & 16 \times 22 \\ & +>-0,1 \end{aligned}$ | 12，9 | － 1 ＝red <br> － 2 ＝yellow <br> － 3 ＝green <br> － 4 ＝orange <br> $\square 6=$ blue <br> $\square 7=$ white <br> $\square 8=\mathrm{red} /$ <br> green $^{\dagger}$ <br> $\square 9$＝red／ <br> yellow ${ }^{\dagger}$ <br> ${ }^{\dagger}$ bicolor |  |  |  |
|  |  |  | $24 \times 24$ |  | $\begin{aligned} & 22 \times 22 \\ & +-0,1 \end{aligned}$ | 15.9 | $\begin{aligned} & \square 1=\text { red } \\ & 2=\text { yellow } \\ & -3=\text { green } \\ & -4=\text { orange } \end{aligned}$ |  |  |  |
| $\begin{aligned} & \overline{\bar{E}} \\ & \overline{\underline{E}} \\ & \text { 믐 } \end{aligned}$ |  |  | $24 \times 48$ | 1 ill． <br> screen <br> 15x15mm， 1 push－ button （latching or non－ latching） | $\begin{aligned} & 22 \times 46 \\ & +-01 \end{aligned}$ | 12.9 | $\begin{aligned} & \square 1=\text { red } \\ & 2=\text { yellow } \\ & \boxed{3}=\text { green } \\ & 4=\text { orange } \\ & \boxed{6}=\text { blue } \\ & \square 7=\text { white } \end{aligned}$ | $\begin{aligned} & \underset{\sim}{0} \\ & \stackrel{0}{0} \\ & 0 \\ & 0 \\ & \underset{\sim}{\sim} \end{aligned}$ |  |  |

a）：Available colours（s）： $1=\square$ red， $2=$ yellow， $3=\square$ green， $4=\square$ orange， $6=\square$ blue， $7=\square$ white Colours for caps of push－buttons：white，green，red，blue，yellow and orange．Please specify when ordering． If no specification is given，push－buttons with white caps will be supplied．
${ }^{\text {b）}}$ ：Voltage：12VDC or 24VDC，other voltages upon request
$\mathrm{S}=$ switch（latching）／ $\mathrm{T}=$ push－button（non latching），to be completed within the art．－no．
Special executions upon request．


[^0]:    a): Colour(s) (from top to bottom): $0=$ blank, $1=\square$ red, $2=$ yellow, $3=\square$ green, $4=\square$ orange, $6=\square$ blue, $7=\square$ white
    ${ }^{\text {b) }}$ : Supply voltage, e.g. 24VDC or 230VAC, other voltages upon request

