

# ГОРЕЛКИ BURNERS

Интегрированные решения для отопления  
All purpose heating solutions

Компания, сертифицированная по Системе менеджмента качества UNI EN ISO 9001

F.B.R. Quality System Certified UNI EN ISO 9001

## ВВЕДЕНИЕ INTRODUCTION

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### ВЫСОКИЕ ТЕХНОЛОГИИ И ОХРАНА ОКРУЖАЮЩЕЙ СРЕДЫ

Поиск технологического совершенства – это наша основная задача. Продукция F.B.R. поступает на рынок только после тщательных исследований и испытаний, кроме того, компания уделяет особой значение теме защиты экологии и охраны окружающей среды. Наша продукция соответствует и сертифицирована по действующим нормам CE, а сама компания имеет сертификат менеджмента качества по системе ISO 9001

### F.B.R. – TECHNOLOGICAL RIGOR AND ECOLOGICAL RESPECT

F.B.R.'s first aim has always been research of the best in technology. Our products are only marketed after stringent trials using the latest in industry led testing procedures with respect and consideration given to any issue relating to the ecological and environmental impact. F.B.R. is qualified by the Quality Management System ISO 9001 and all our products are certified and conform to the current CE norms.

### ГОРЕЛКИ ДЛЯ ДИЗЕЛЬНОГО ТОПЛИВА LIGHT OIL BURNERS

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### ГОРЕЛКИ ДЛЯ ГАЗА/ДИЗЕЛЬНОГО ТОПЛИВА ДЛЯ ГАЗА/ТЯЖЕЛОГО ТОПЛИВА KN DUAL FUEL BURNERS GAS/LIGHT OIL GAS/HEAVY OIL KN

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### ПРОМЫШЛЕННЫЕ ГОРЕЛКИ INDUSTRIAL BURNERS

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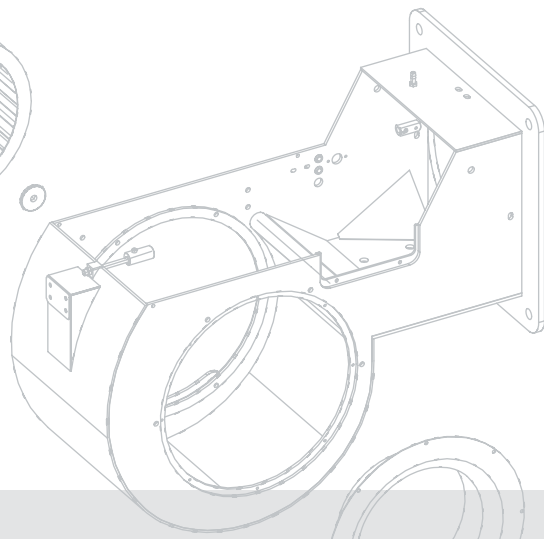
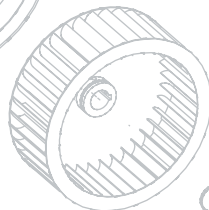
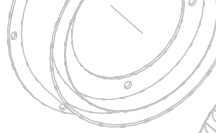


**МЫ ЛОВИМ ОГОНЬ, ЧТОБЫ ОСВОБОДИТЬ  
ТЕПЛО.**

**Capturing the fire  
to free heat.**







Начиная с 1969 года, компания F.B.R. разрабатывает и производит высокотехнологичные горелки для промышленного и гражданского применения.

Помимо представленных здесь самых обычных разработок, компания F.B.R. может поставлять специальные версии, такие как высокомощные горелки и горелки для альтернативных видов топлива, таких как ЭКОЛОГИЧЕСКОЕ ДИЗЕЛЬНОЕ ТОПЛИВО, BTZ (низкое содержание серы) и масла растительного происхождения (такие как рапсовое и подсолнечное).

Since 1969 F.B.R. has designed and manufactured high-tech burners for industrial and civil applications. In addition to the standard product range, F.B.R. also supplies high power burners and burners for alternative fuels such as biodiesel, "BTZ" (low sulfur oil) and vegetable oils (i.e. colza oil, sunflower oil).



ЦЕНТР И  
И Р  
Реализа  
ЭТ

**F.B.R. RESEARCH & DEVELOPMENT**  
Our job  
on your machine





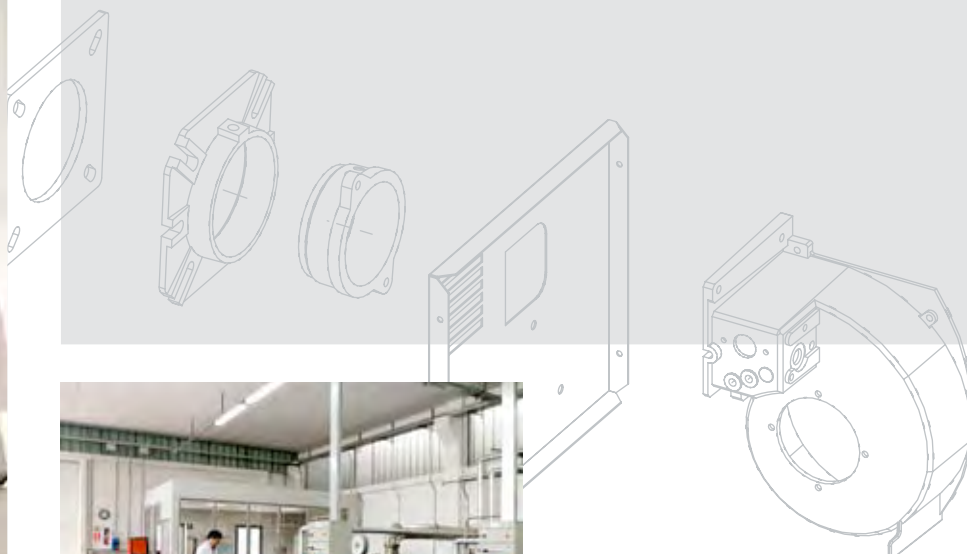
ИССЛЕДОВАНИЙ  
РАЗВИТИЯ F.B.R.  
для ваших идей  
это наша работа.

DEVELOPMENT LAB  
Our job is to focus  
on your requirements.



Лаборатория исследований и развития компании F.B.R. обеспечивает высокое качество и постоянное технологическое развитие наших горелок, которые продаются в более чем 80 странах мира.

F.B.R. Laboratory of Research & Development guarantees the highest quality and the continuous technological progress of our burners, distributed in over 80 countries across the world.



**ГОРЕЛКИ ДЛЯ ДИЗЕЛЬНОГО ТОПЛИВА**  
**LIGHT OIL BURNERS**



1



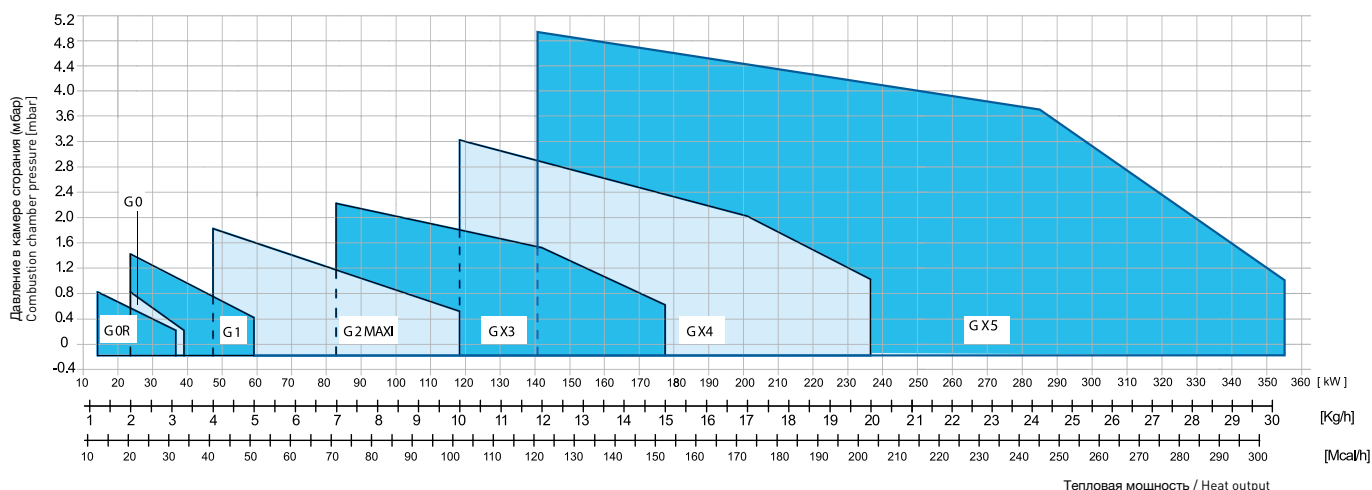
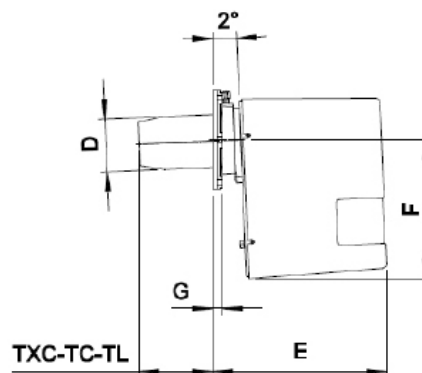
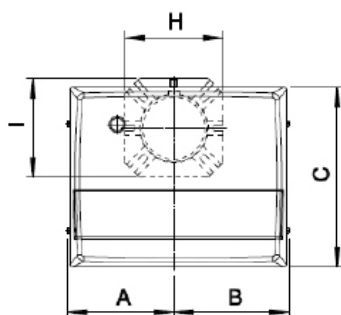
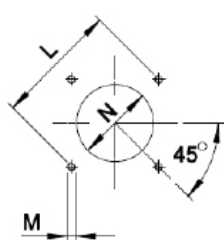




| ОДНОСТУПЕНЧАТЫЕ<br>1 STAGE                    | kg/h |     | kW   |      | 1F |
|-----------------------------------------------|------|-----|------|------|----|
|                                               | min  | max | min  | max  |    |
| G 0S 2001/2003* - G 0H 2001                   | 2    | 3,3 | 23,7 | 39,1 | 1F |
| G 0SR 2001/2003* - G 0HR 2001                 | 1,2  | 3,1 | 14,2 | 36,7 |    |
| G 1S 2001/2003* - G 1H 2001 - G 1R 2001/2003* | 2    | 5   | 23,7 | 59,2 |    |
| G 2S MAXI* - G 2H MAXI                        | 4    | 9,8 | 47,3 | 116  |    |
| G X3S - G X3H                                 | 7    | 15  | 83   | 178  |    |
| G X4S - G X4H                                 | 10   | 20  | 118  | 236  |    |
| G X5S - G X5H                                 | 12   | 30  | 142  | 355  |    |

\* Имеются также в версии Low Nox  
\* Available also in Low NOx version

ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL |     |     |     |     |     |     |    |     |     |       |     |       |     |       |     |       | * советова/ Suggested<br>** TXC = 77 |     |
|-----------------|-----|-----|-----|-----|-----|-----|----|-----|-----|-------|-----|-------|-----|-------|-----|-------|--------------------------------------|-----|
|                 | A   | B   | C   | D   | E   | F   | G  | H   | I   | L min | L * | L max | M   | N min | N * | N max | TC                                   | TL  |
| G 0... 2001     | 137 | 137 | 240 | 80  | 223 | 169 | 15 | 150 | 150 | 130   | 150 | 170   | M8  | 90    | 110 | 130   | 112                                  | 152 |
| G 0...2003 **   | 137 | 137 | 240 | 83  | 223 | 169 | 15 | 150 | 150 | 130   | 150 | 170   | M8  | 90    | 110 | 130   | 112                                  | 152 |
| G 1... 2001     | 157 | 170 | 275 | 80  | 265 | 210 | 15 | 150 | 150 | 130   | 150 | 170   | M8  | 90    | 110 | 130   | 112                                  | 152 |
| G 1...2003      | 157 | 170 | 275 | 83  | 265 | 210 | 15 | 150 | 150 | 130   | 150 | 170   | M8  | 90    | 110 | 130   | 112                                  | 152 |
| G 2...MAXI      | 157 | 170 | 275 | 90  | 265 | 210 | 15 | 150 | 150 | 130   | 150 | 170   | M8  | 100   | 110 | 130   | 107                                  | 147 |
| G X3...         | 182 | 192 | 318 | 110 | 306 | 248 | 17 | 200 | 200 | 160   | 170 | 226   | M10 | 120   | 130 | 140   | 130                                  | 250 |
| G X4...         | 182 | 192 | 318 | 124 | 306 | 248 | 17 | 200 | 200 | 170   | 205 | 226   | M10 | 130   | 140 | 160   | 130                                  | 250 |
| G X5...         | 210 | 218 | 400 | 130 | 461 | 310 | 18 | 200 | 200 | 205   | 220 | 226   | M10 | 140   | 150 | 180   | 215                                  | 335 |



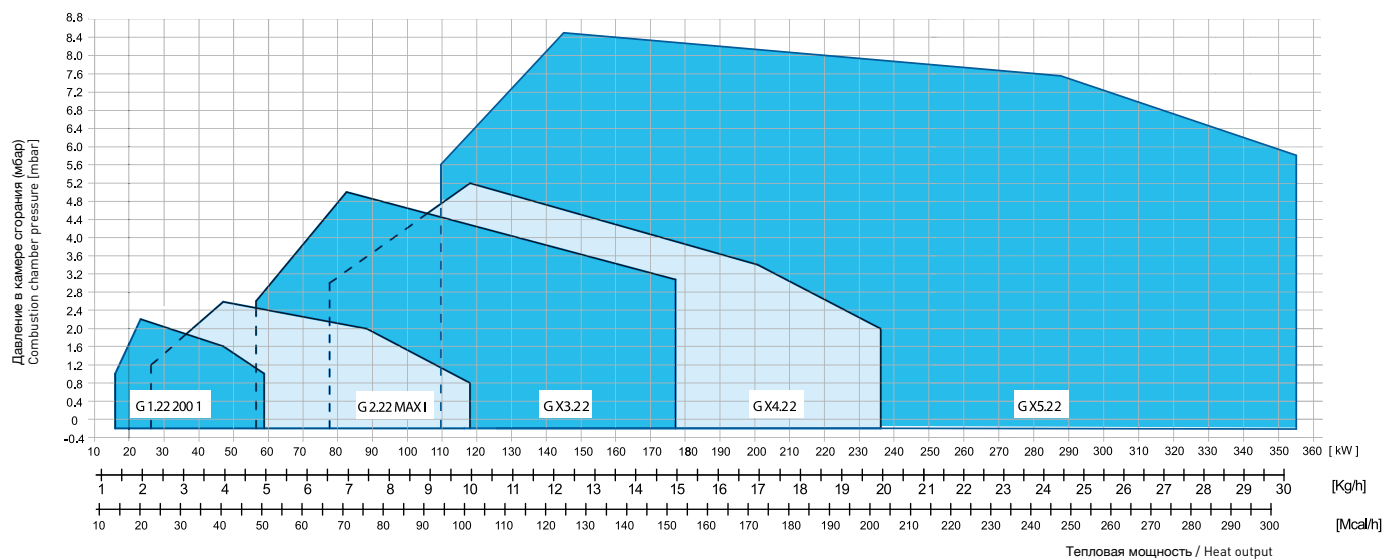
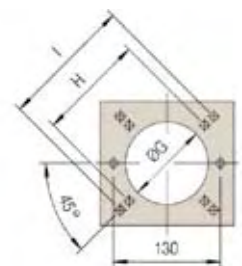
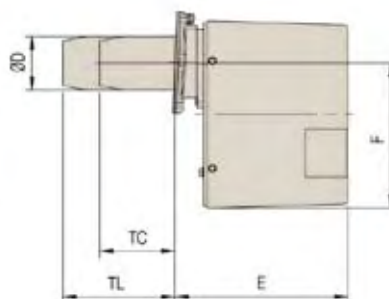
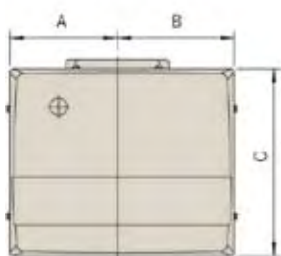
### ДВУХСТУПЕНЧАТАЯ С ПЕРЕПАДОМ ДАВЛЕНИЯ 2 STAGE WITH JUMP OF PRESSURE

|              | kg/h |     | kW   |      | 1F |
|--------------|------|-----|------|------|----|
|              | min  | max | min  | max  |    |
| G 1.22 2001  | 2    | 5   | 23,7 | 59,2 |    |
| G 2.22 MAXI* | 4    | 9,8 | 47,3 | 116  |    |
| G X 3.22     | 7    | 15  | 83   | 178  |    |
| G X 4.22     | 10   | 20  | 118  | 236  |    |
| G X 5.22     | 12   | 30  | 142  | 355  |    |

\* Имеются также в версии Low Nox

\* Available also in Low NOx version

### ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



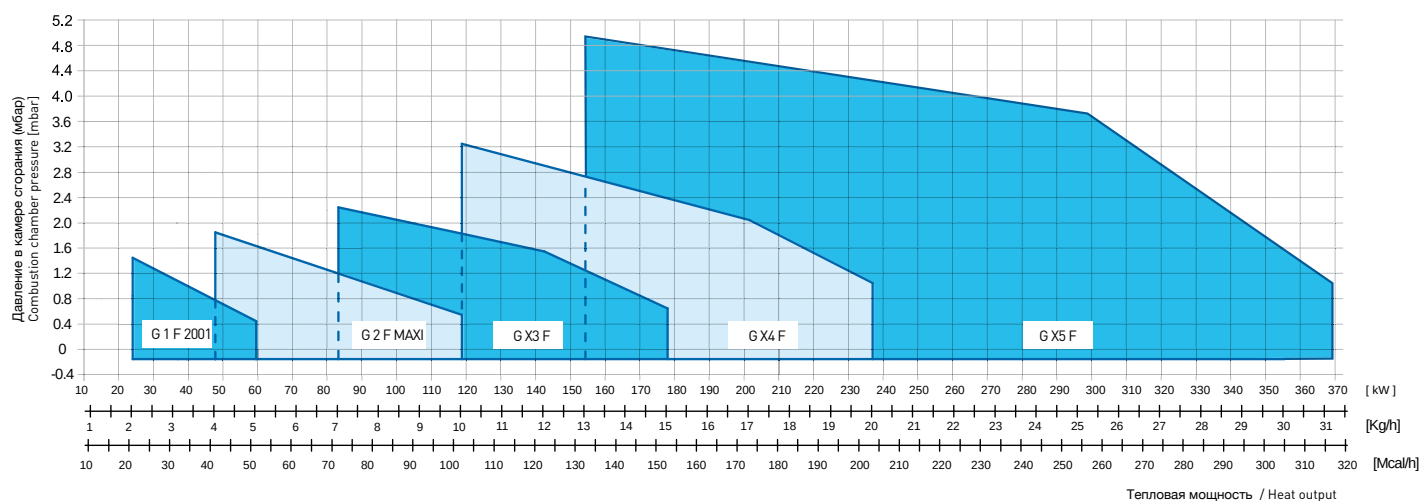
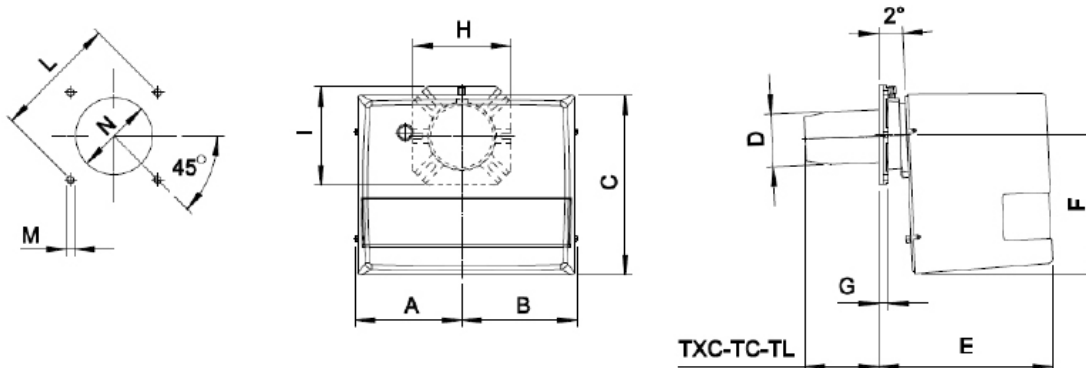
#### МОДЕЛЬ MODEL

| МОДЕЛЬ<br>MODEL | A   | B   | C   | D   | E   | F   | G   | H   | I   | TC  | TL  |
|-----------------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| G 1.22 2001     | 157 | 170 | 275 | 80  | 265 | 210 | 90  | 130 | 160 | 112 | 152 |
| G 2.22 MAXI     | 157 | 170 | 275 | 90  | 265 | 210 | 100 | 130 | 160 | 112 | 152 |
| G X 3.22        | 179 | 189 | 318 | 110 | 298 | 248 | 120 | 160 | 226 | 130 | 250 |
| G X 4.22        | 179 | 189 | 318 | 124 | 298 | 248 | 135 | 160 | 226 | 130 | 250 |
| G X 5.22        | 207 | 213 | 400 | 130 | 461 | 310 | 140 | 205 | 226 | 215 | 335 |



| ОДНОСТУПЕНЧАТЫЕ для хлебопекарных печей<br>1 STAGE for bakery ovens | kg/h |     | kW   |      |    |
|---------------------------------------------------------------------|------|-----|------|------|----|
|                                                                     | min  | max | min  | max  |    |
| G 1 F 2001                                                          | 2    | 5   | 23,7 | 59,2 | 1F |
| G 2 F MAXI                                                          | 4    | 9,8 | 47,3 | 116  |    |
| G X3 F                                                              | 7    | 15  | 83   | 178  |    |
| G X4 F                                                              | 10   | 20  | 118  | 236  |    |
| G X5 F                                                              | 12   | 30  | 142  | 355  |    |

## ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL | A   | B   | C   | D   | E   | F   | G  | H   | I   | L min | L * | L max | M   | N min | N * | N max | TC  | TL  |
|-----------------|-----|-----|-----|-----|-----|-----|----|-----|-----|-------|-----|-------|-----|-------|-----|-------|-----|-----|
| G 1 F           | 157 | 170 | 275 | 80  | 265 | 210 | 15 | 150 | 150 | 130   | 150 | 170   | M8  | 90    | 110 | 130   | 112 | 152 |
| G 2 F MAXI      | 157 | 170 | 275 | 90  | 265 | 210 | 15 | 150 | 150 | 130   | 150 | 170   | M8  | 100   | 110 | 130   | 107 | 147 |
| G X3 F          | 182 | 192 | 318 | 110 | 306 | 248 | 17 | 200 | 200 | 160   | 170 | 226   | M10 | 120   | 130 | 140   | 130 | 250 |
| G X4 F          | 182 | 192 | 318 | 124 | 306 | 248 | 17 | 200 | 200 | 170   | 205 | 226   | M10 | 130   | 140 | 160   | 130 | 250 |
| G X5 F          | 210 | 218 | 400 | 130 | 461 | 310 | 18 | 200 | 200 | 205   | 220 | 226   | M10 | 140   | 150 | 180   | 215 | 335 |

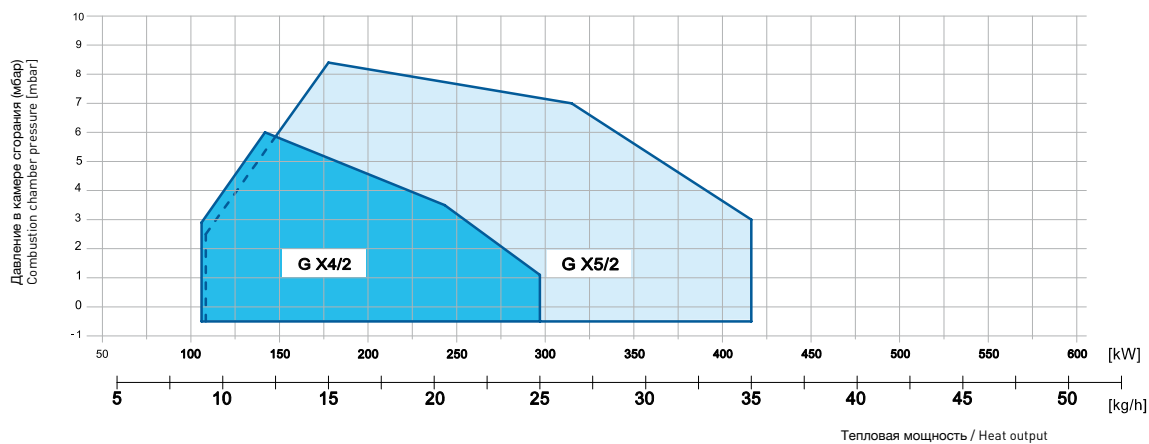
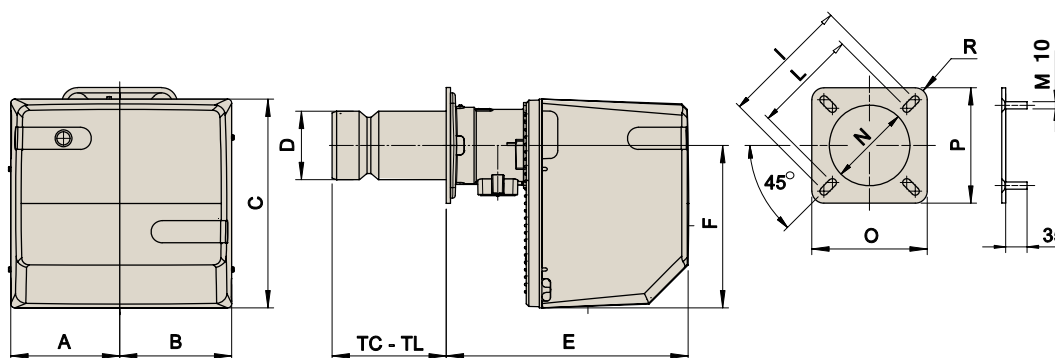
\* советова/ Suggested





| ДВУХСТУПЕНЧАТЫЕ<br>2 STAGES | kg/h |     | kW  |     | 1F |
|-----------------------------|------|-----|-----|-----|----|
|                             | min  | max | min | max |    |
| GX 4/2                      | 12   | 25  | 142 | 296 | 1F |
| GX 5/2                      | 15   | 35  | 178 | 415 |    |

## ТЕПЛОВЫЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)

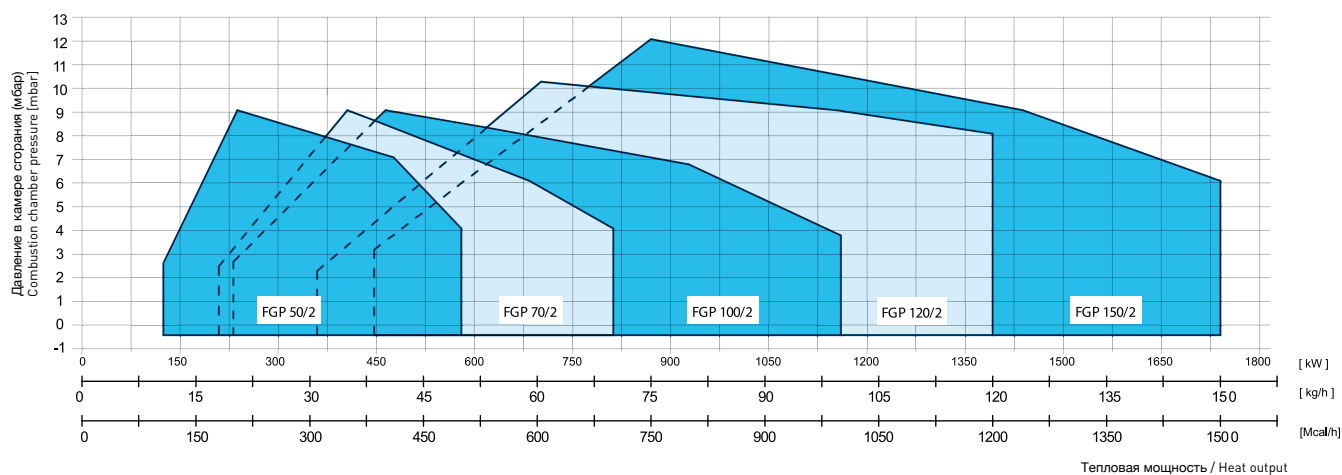
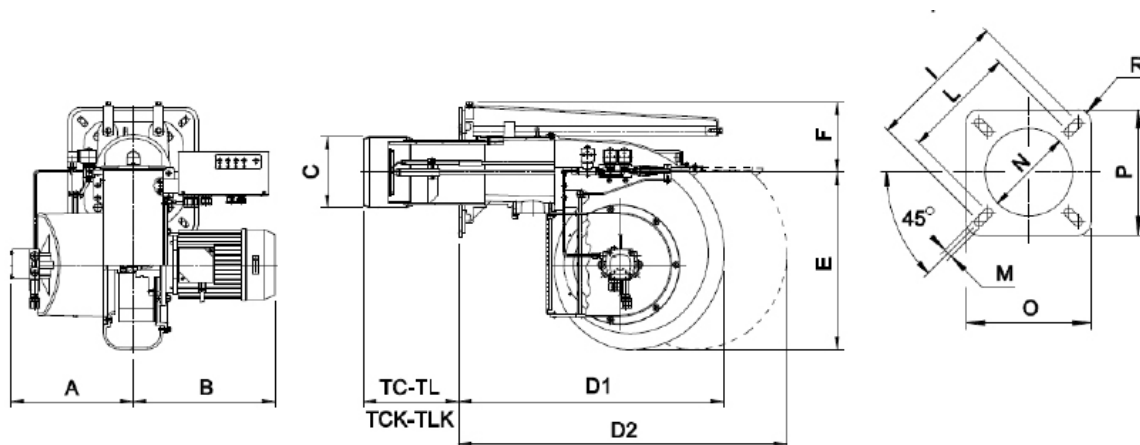


| МОДЕЛЬ<br>MODEL | A   | B   | C   | D   | E   | F   | I   | L   | N   | O   | P   | R   | TC  | TL  |
|-----------------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| G X4/2          | 179 | 189 | 318 | 124 | 306 | 248 | 226 | 160 | 135 | 200 | 200 | R20 | 130 | 250 |
| G X5/2          | 207 | 213 | 400 | 130 | 461 | 310 | 226 | 205 | 140 | 220 | 220 | R30 | 215 | 335 |



| ДВУХСТУПЕНЧАТЫЕ<br>2 STAGES | kg/h |     | kW  |      | 3F |
|-----------------------------|------|-----|-----|------|----|
|                             | min  | max | min | max  |    |
| FGP 50/2                    | 20   | 50  | 237 | 592  | 3F |
| FGP 70/2                    | 35   | 70  | 406 | 812  |    |
| FGP 100/2                   | 40   | 100 | 464 | 1160 |    |
| FGP 120/2                   | 60   | 120 | 696 | 1392 |    |
| FGP 150/2                   | 75   | 150 | 870 | 1740 |    |

ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



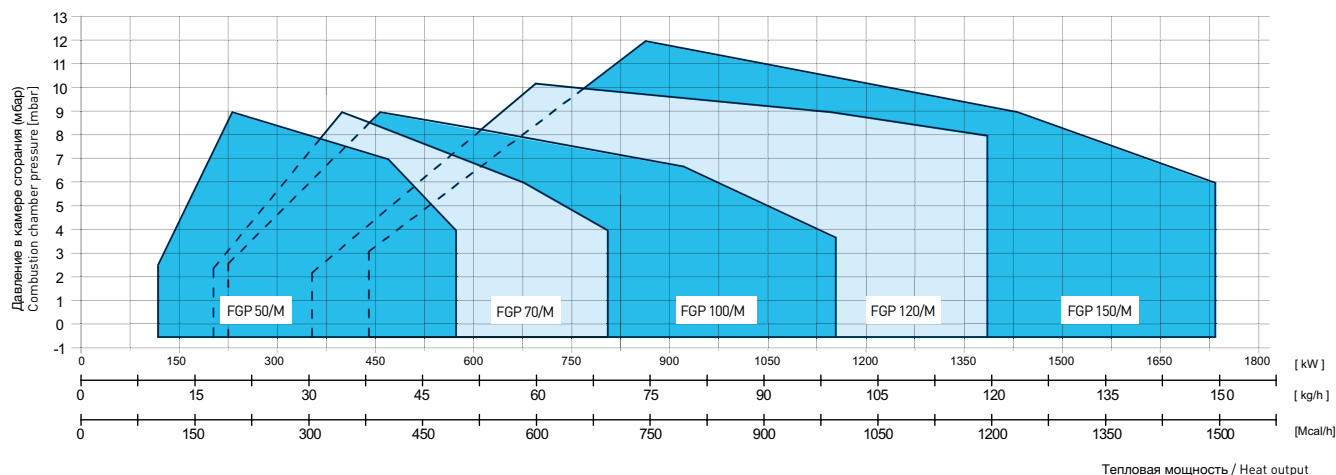
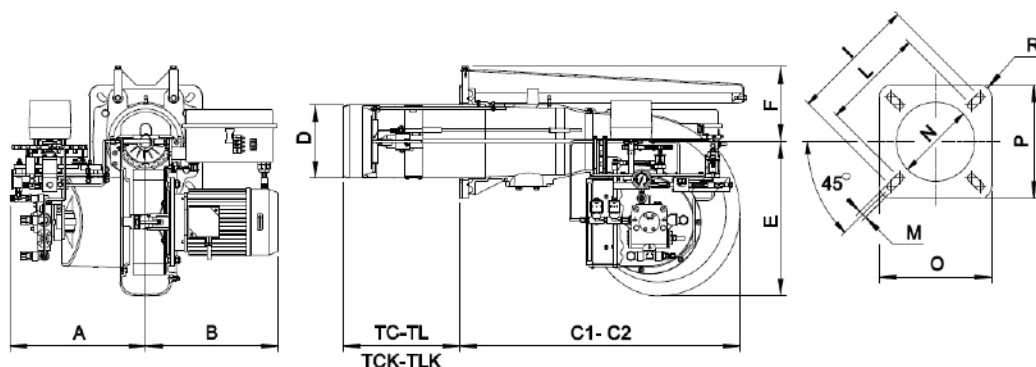
| МОДЕЛЬ<br>MODEL | A   | B   | C   | D1  | D2   | E   | F   | TC  | TCK | TLK | TL  | I   | L   | M   | N   | O   | P   | R   |
|-----------------|-----|-----|-----|-----|------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| FGP 50/2        | 188 | 324 | 150 | 493 | -    | 327 | 100 | 250 | -   | -   | 335 | 226 | 205 | M10 | 160 | 220 | 220 | R30 |
| FGP 70/2        | 250 | 310 | 165 | 660 | 1060 | 327 | 171 | 170 | 250 | -   | 335 | 368 | 340 | M12 | 180 | 320 | 320 | R20 |
| FGP 100/2       | 300 | 350 | 175 | 670 | 1170 | 438 | 173 | 200 | 235 | 370 | 435 | 368 | 340 | M12 | 190 | 320 | 320 | R20 |
| FGP 120/2       | 350 | 380 | 212 | 820 | 1400 | 438 | 213 | 200 | -   | -   | 400 | 368 | 340 | M14 | 230 | 320 | 320 | R30 |
| FGP 150/2       | 350 | 380 | 212 | 820 | 1400 | 438 | 213 | 200 | -   | -   | 400 | 368 | 340 | M14 | 230 | 320 | 320 | R30 |



## ПРОГРЕССИВНЫЕ И МОДУЛИРУЮЩИЕ PROGRESSIVE & MODULATING

|           | kg/h |     | kW  |      |    |
|-----------|------|-----|-----|------|----|
|           | min  | max | min | max  |    |
| FGP 50/M  | 20   | 50  | 237 | 592  | 3F |
| FGP 70/M  | 35   | 70  | 406 | 812  |    |
| FGP 100/M | 40   | 100 | 464 | 1160 |    |
| FGP 120/M | 60   | 120 | 696 | 1392 |    |
| FGP 150/M | 75   | 150 | 870 | 1740 |    |

## ТЕПЛОВЫЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



## МОДЕЛЬ MODEL

| МОДЕЛЬ<br>MODEL | A   | B   | C1  | C2   | D   | E   | F   | I   | L   | M   | N   | O   | P   | R   | TC  | TCK | TL  | TLK |
|-----------------|-----|-----|-----|------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| FGP 50/M        | 350 | 305 | 530 | -    | 150 | 327 | 145 | 226 | 205 | M10 | 160 | 220 | 220 | R30 | 250 | -   | 335 | -   |
| FGP 70/M        | 350 | 310 | 700 | 1140 | 165 | 327 | 171 | 368 | 340 | M12 | 180 | 320 | 320 | R20 | -   | 250 | 335 | -   |
| FGP 100/M       | 386 | 375 | 651 | 1150 | 175 | 438 | 173 | 368 | 340 | M12 | 190 | 320 | 320 | R20 | -   | 235 | -   | 370 |
| FGP 120/M       | 386 | 376 | 815 | 1395 | 209 | 438 | 213 | 368 | 340 | M14 | 230 | 320 | 320 | R20 | 200 | -   | 400 | -   |
| FGP 150/M       | 386 | 397 | 815 | 1395 | 209 | 438 | 213 | 368 | 340 | M14 | 230 | 320 | 320 | R20 | 200 | -   | 400 | -   |



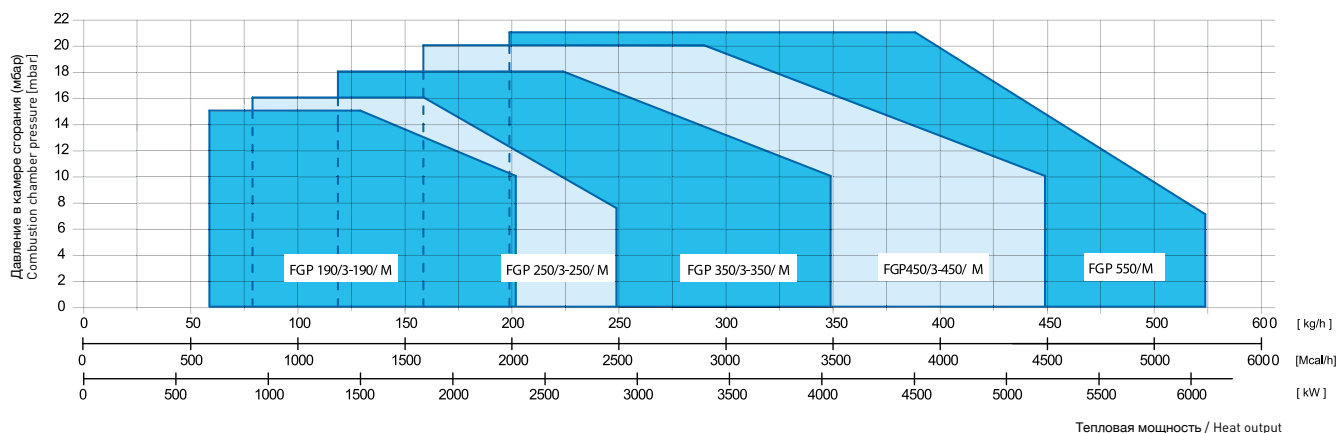
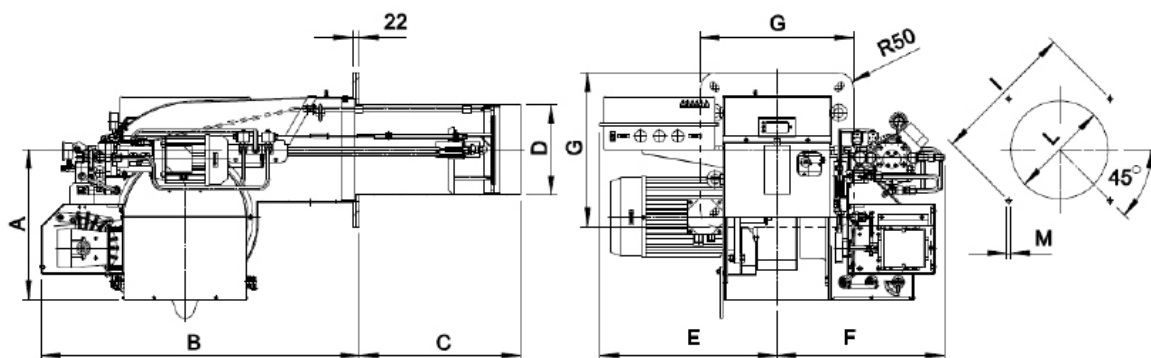


| ТРЕХСТУПЕНЧАТЫЕ<br>3 STAGES | ПРОГРЕССИВНЫЕ И МОДУЛИРУЮЩИЕ<br>PROGRESSIVE & MODULATING | kg/h |      | kW   |       |    |
|-----------------------------|----------------------------------------------------------|------|------|------|-------|----|
|                             |                                                          | min  | max  | min  | max   |    |
| FGP 190/3                   | FGP 190/M *                                              | 60   | 206  | 700  | 2390  | 3F |
| FGP 250/3                   | FGP 250/M *                                              | 80   | 250  | 930  | 2900  |    |
| FGP 350/3                   | FGP 350/M *                                              | 140  | 350  | 1620 | 4060  |    |
| FGP 450/3                   | FGP 450/M *                                              | 160  | 450  | 1850 | 5220  |    |
|                             | FGP 550/M *                                              | 200  | 550  | 2320 | 6380  |    |
|                             | FGP 650/M *                                              | 300  | 650  | 3488 | 7558  |    |
|                             | FGP 750/M *                                              | 350  | 750  | 4070 | 8721  |    |
|                             | FGP 1000/M *                                             | 345  | 1000 | 4000 | 11628 |    |

\* Поставляются также версии с ИНВЕРТОРОМ и ЭЛЕКТРОННЫМ КУЛАЧКОМ

\* Available also versions with INVERTER and ELECTRONIC BURNER CONTROL

ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL | * советова/ Suggested |      |     |     |     |     |     |       |     |       |       |     |       |     |
|-----------------|-----------------------|------|-----|-----|-----|-----|-----|-------|-----|-------|-------|-----|-------|-----|
|                 | A                     | B    | C   | D   | E   | F   | G   | I min | I * | I max | L min | L * | L max | M   |
| FGP 190/3       | 453                   | 835  | 495 | 234 | 429 | 429 | 360 | 396   | 424 | 438   | 245   | 280 | 320   | M14 |
| FGP 250/3       | 453                   | 835  | 500 | 271 | 429 | 460 | 360 | 396   | 424 | 438   | 280   | 280 | 320   | M14 |
| FGP 350/3       | 481                   | 942  | 535 | 334 | 507 | 517 | 490 | 552   | 552 | 580   | 350   | 350 | 450   | M14 |
| FGP 450/3       | 481                   | 942  | 560 | 380 | 537 | 517 | 490 | 552   | 552 | 580   | 390   | 390 | 450   | M14 |
| FGP 190/M       | 453                   | 920  | 495 | 234 | 430 | 530 | 360 | 396   | 424 | 438   | 245   | 280 | 320   | M14 |
| FGP 250/M       | 453                   | 920  | 500 | 271 | 430 | 530 | 360 | 396   | 424 | 438   | 280   | 280 | 320   | M14 |
| FGP 350/M       | 481                   | 1025 | 535 | 334 | 571 | 540 | 490 | 552   | 552 | 580   | 350   | 350 | 450   | M14 |
| FGP 450/M       | 481                   | 1025 | 560 | 380 | 571 | 540 | 490 | 552   | 552 | 580   | 390   | 390 | 450   | M14 |
| FGP 550/M       | 481                   | 1025 | 560 | 380 | 661 | 540 | 490 | 552   | 552 | 580   | 390   | 410 | 450   | M14 |

# ГОРЕЛКИ ДЛЯ ТЯЖЕЛОГО ТОПЛИВА HEAVY OIL BURNERS



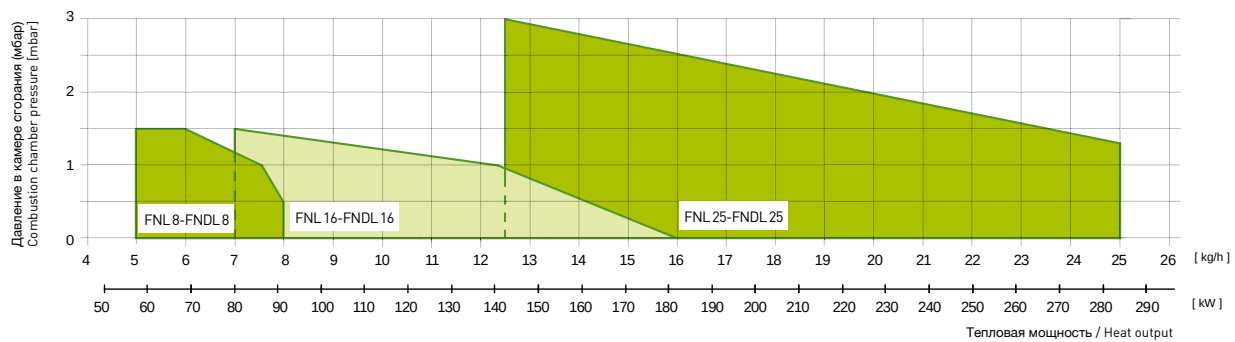
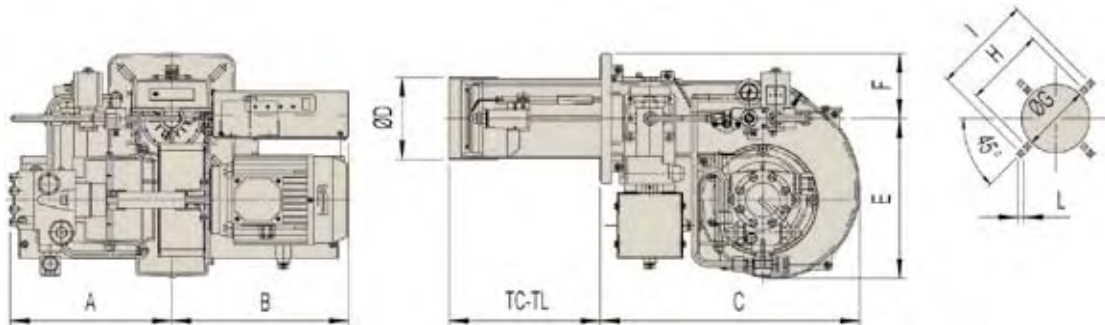
2





| ОДНОСТУПЕНЧАТЫЕ для жидкого тяжелого топлива<br>1 STAGE<br>for fluid heavy oil | ОДНОСТУПЕНЧАТЫЕ для вязкого тяжелого топлива<br>1 STAGE<br>for dense heavy oil | kg/h |     | kW  |     |    |
|--------------------------------------------------------------------------------|--------------------------------------------------------------------------------|------|-----|-----|-----|----|
|                                                                                |                                                                                | min  | max | min | max |    |
| FNL 8                                                                          | FNDL 8                                                                         | 5    | 8   | 57  | 91  | 1F |
| FNL 16                                                                         | FNDL 16                                                                        | 7    | 16  | 80  | 182 |    |
| FNL 25                                                                         | FNDL 25                                                                        | 12,5 | 25  | 142 | 284 | 3F |

## ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)

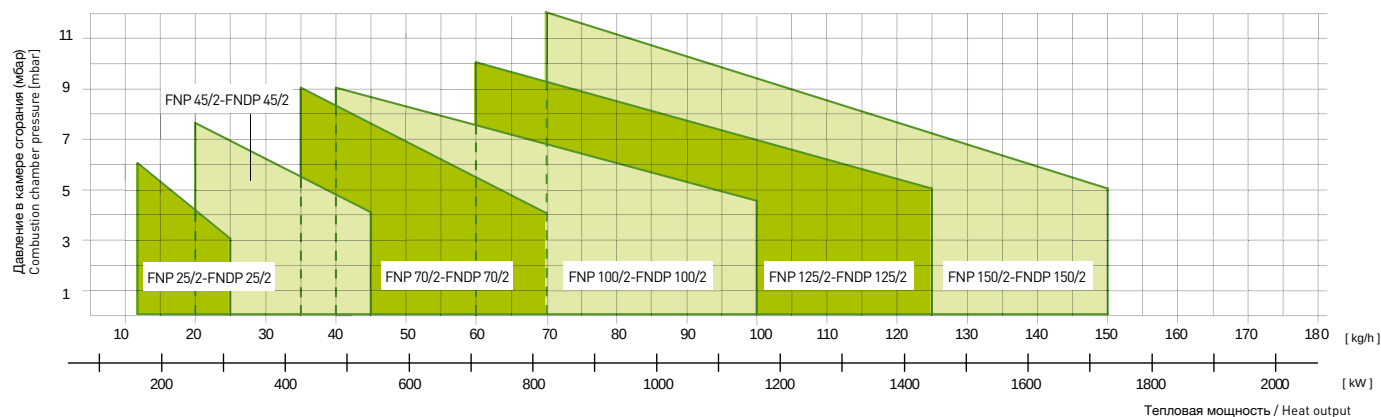
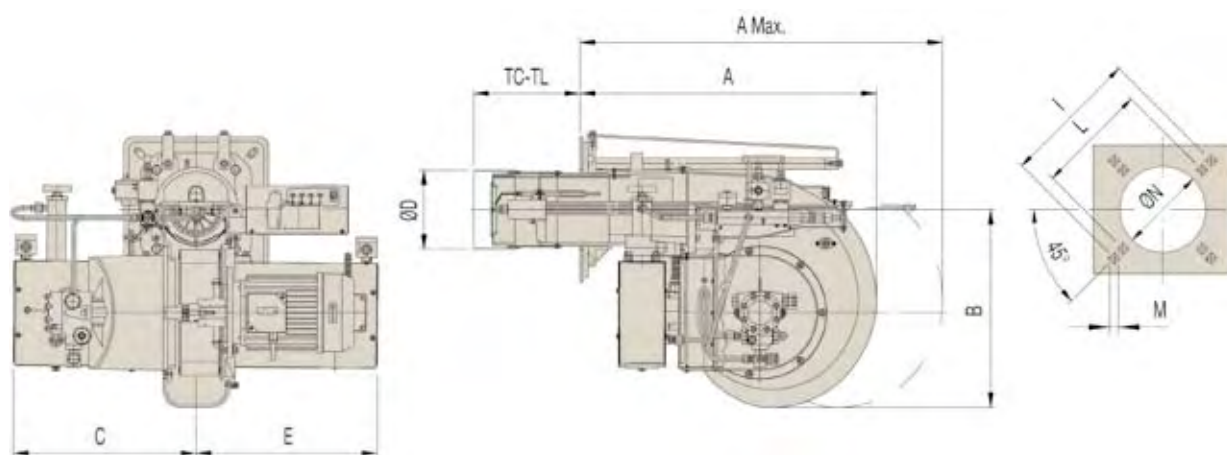


| МОДЕЛЬ<br>MODEL |         | A   | B   | C   | D   | E   | F   | G   | H   | I   | L   | TC  | TL  |
|-----------------|---------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| FNL 8           | FNDL 8  | 253 | 294 | 410 | 107 | 251 | 102 | 120 | 180 | 226 | M10 | 110 | 230 |
| FNL 16          | FNDL 16 | 253 | 294 | 410 | 107 | 251 | 102 | 120 | 180 | 226 | M10 | 110 | 230 |
| FNL 25          | FNDL 25 | 255 | 294 | 410 | 130 | 251 | 102 | 140 | 180 | 226 | M10 | 120 | 240 |



| ДВУХСТУПЕНЧАТЫЕ для жидкого<br>тяжелого топлива<br>2 STAGES<br>for fluid heavy oil | ДВУХСТУПЕНЧАТЫЕ для вязкого<br>тяжелого топлива<br>2 STAGES<br>for dense heavy oil | kg/h |     | kW  |      | 3F |
|------------------------------------------------------------------------------------|------------------------------------------------------------------------------------|------|-----|-----|------|----|
|                                                                                    |                                                                                    | min  | max | min | max  |    |
| FNP 25/2                                                                           | FNDP 25/2                                                                          | 12,5 | 25  | 142 | 284  |    |
| FNP 45/2                                                                           | FNDP 45/2                                                                          | 20   | 45  | 227 | 512  |    |
| FNP 70/2                                                                           | FNDP 70/2                                                                          | 35   | 70  | 398 | 796  |    |
| FNP 100/2                                                                          | FNDP 100/2                                                                         | 40   | 100 | 455 | 1137 |    |
| FNP 125/2                                                                          | FNDP 125/2                                                                         | 60   | 125 | 682 | 1421 |    |
| FNP 150/2                                                                          | FNDP 150/2                                                                         | 70   | 150 | 796 | 1705 |    |

## ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



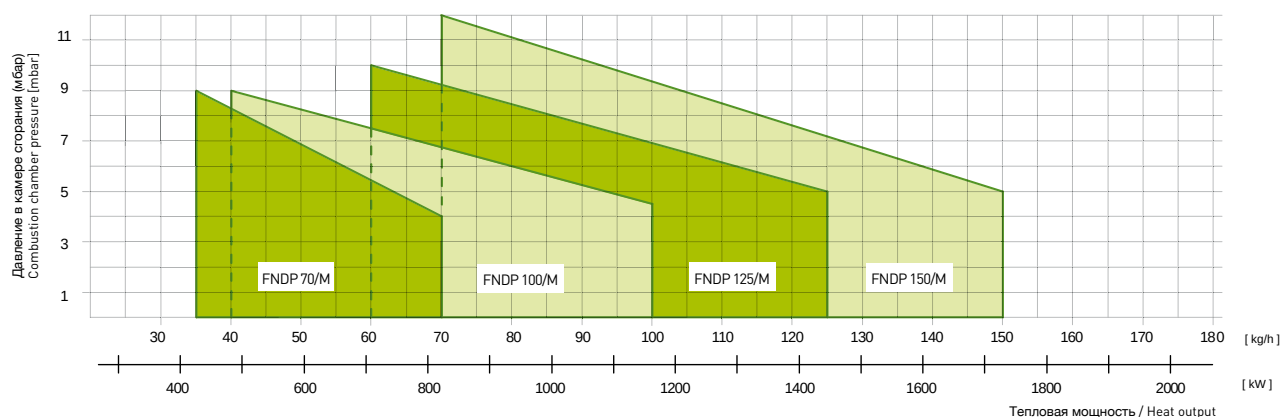
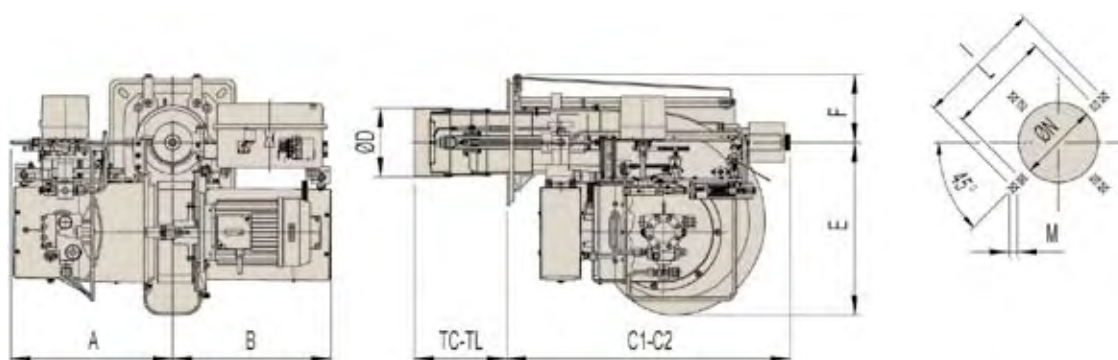
| МОДЕЛЬ<br>MODEL |            | A   | A Max. | B   | C   | D   | E   | TC  | TL  | I   | L   | M   | N   |
|-----------------|------------|-----|--------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| FNP 25/2        | FNDP 25/2  | 540 | 950    | 325 | 295 | 135 | 319 | 170 | 350 | 340 | 283 | M12 | 145 |
| FNP 45/2        | FNDP 45/2  | 540 | 950    | 325 | 295 | 155 | 319 | 170 | 350 | 340 | 283 | M12 | 160 |
| FNP 70/2        | FNDP 70/2  | 660 | 1100   | 355 | 295 | 165 | 326 | 250 | 350 | 368 | 340 | M12 | 180 |
| FNP 100/2       | FNDP 100/2 | 656 | 1085   | 440 | 410 | 175 | 400 | 235 | 335 | 368 | 340 | M12 | 190 |
| FNP 125/2       | FNDP 125/2 | 820 | 1400   | 520 | 420 | 209 | 400 | 200 | 400 | 368 | 340 | M14 | 230 |
| FNP 150/2       | FNDP 150/2 | 820 | 1400   | 520 | 420 | 209 | 400 | 200 | 400 | 368 | 340 | M14 | 230 |





| ПРОГРЕССИВНЫЕ И МОДУЛИРУЮЩИЕ<br>PROGRESSIVE & MODULATING | kg/h |     | kW  |      | 3F |
|----------------------------------------------------------|------|-----|-----|------|----|
|                                                          | min  | max | min | max  |    |
| FNDP 70/M                                                | 35   | 70  | 398 | 796  | 3F |
| FNDP 100/M                                               | 40   | 100 | 455 | 1137 |    |
| FNDP 125/M                                               | 60   | 125 | 682 | 1421 |    |
| FNDP 150/M                                               | 75   | 150 | 853 | 1705 |    |

ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



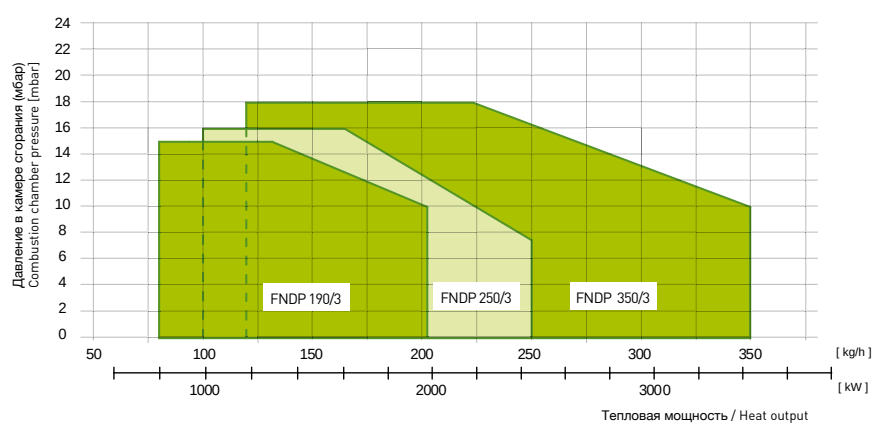
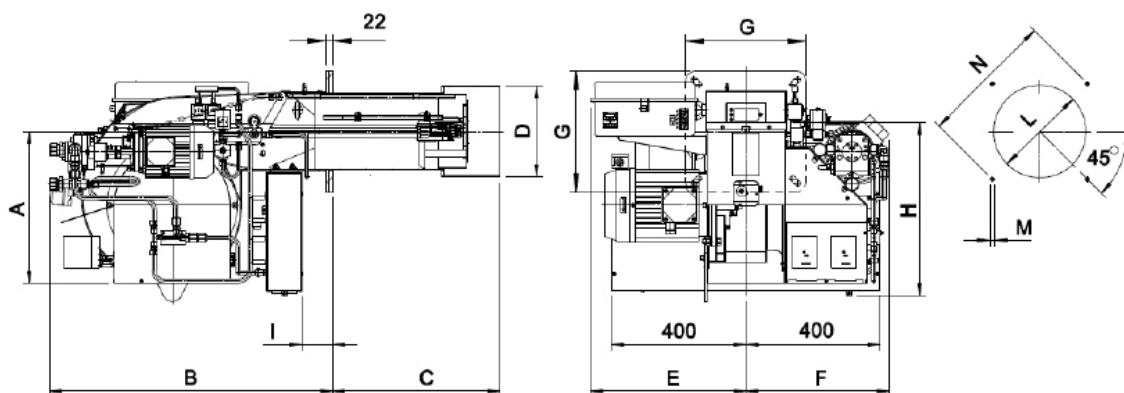
| МОДЕЛЬ<br>MODEL | A   | B   | C1  | C2   | D   | E   | F   | TC  | TL  | I   | L   | M   | N   |
|-----------------|-----|-----|-----|------|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| FNDP 70/M       | 360 | 385 | 735 | 1175 | 165 | 355 | 171 | 250 | 350 | 368 | 340 | M12 | 180 |
| FNDP 100/M      | 410 | 400 | 720 | 1150 | 175 | 440 | 173 | 235 | 335 | 368 | 340 | M12 | 190 |
| FNDP 125/M      | 420 | 400 | 860 | 1440 | 209 | 520 | 213 | 200 | 400 | 368 | 340 | M14 | 230 |
| FNDP 150/M      | 420 | 400 | 860 | 1440 | 209 | 520 | 213 | 200 | 400 | 368 | 340 | M14 | 230 |



### ТРЕХСТУПЕНЧАТЫЕ 3 STAGES

|            | kg/h |     | kW   |      |    |
|------------|------|-----|------|------|----|
|            | min  | max | min  | max  |    |
| FNDP 190/3 | 80   | 206 | 909  | 2341 | 3F |
| FNDP 250/3 | 100  | 250 | 1137 | 2842 |    |
| FNDP 350/3 | 120  | 350 | 1364 | 3979 |    |

### ТЕПЛОВЫЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL | A   | B   | C   | D   | E   | F   | G   | H   | I  | L min | L max | M   | N min | N max | R   |
|-----------------|-----|-----|-----|-----|-----|-----|-----|-----|----|-------|-------|-----|-------|-------|-----|
| FNDP 190/3      | 453 | 850 | 495 | 234 | 464 | 430 | 360 | 490 | 93 | 245   | 320   | M14 | 396   | 438   | R30 |
| FNDP 250/3      | 453 | 850 | 500 | 271 | 464 | 430 | 360 | 490 | 93 | 280   | 320   | M14 | 396   | 438   | R30 |
| FNDP 350/3      | 481 | 942 | 535 | 334 | 575 | 488 | 490 | 494 | 75 | 350   | 450   | M14 | 552   | 580   | R50 |

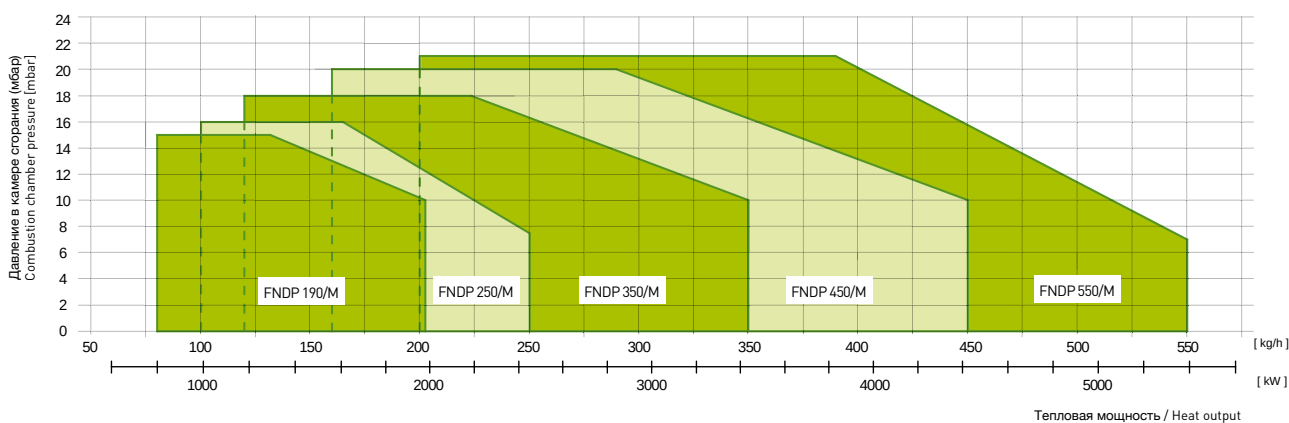
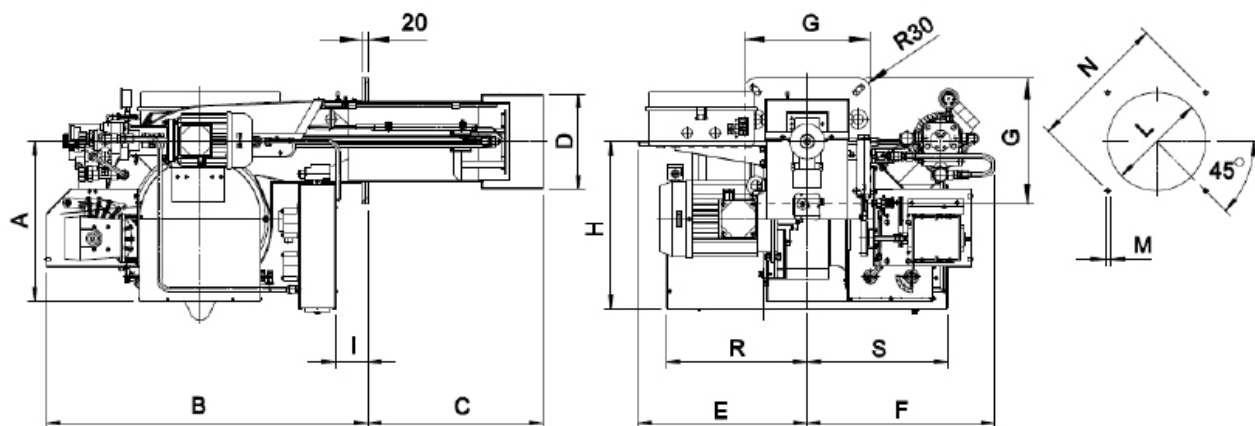


| ПРОГРЕССИВНЫЕ И МОДУЛИРУЮЩИЕ<br>PROGRESSIVE & MODULATING | kg/h |      | kW   |       |    |
|----------------------------------------------------------|------|------|------|-------|----|
|                                                          | min  | max  | min  | max   |    |
| FNDP 190/M *                                             | 80   | 206  | 909  | 2341  | 3F |
| FNDP 250/M *                                             | 100  | 250  | 1137 | 2842  |    |
| FNDP 350/M *                                             | 120  | 350  | 1364 | 3979  |    |
| FNDP 450/M *                                             | 160  | 450  | 1819 | 5116  |    |
| FNDP 550/M *                                             | 200  | 550  | 2274 | 6252  |    |
| FNDP 650/M *                                             | 300  | 650  | 3488 | 7558  |    |
| FNDP 750/M *                                             | 350  | 750  | 4070 | 8721  |    |
| FNDP 1000/M *                                            | 345  | 1000 | 4000 | 11628 |    |

\* Поставляются также версии с ИНВЕРТОРОМ и ЭЛЕКТРОННЫМ КУЛАЧКОМ

\* Available also versions with INVERTER and ELECTRONIC BURNER CONTROL

## ТЕПЛОВЫЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL | * советова/ Suggested |      |     |     |     |     |     |     |    |       |     |       |     |       |     |       |     |     |
|-----------------|-----------------------|------|-----|-----|-----|-----|-----|-----|----|-------|-----|-------|-----|-------|-----|-------|-----|-----|
|                 | A                     | B    | C   | D   | E   | F   | G   | H   | I  | L min | L*  | L max | M   | N min | N*  | N max | R   | S   |
| FNDP 190/M      | 453                   | 920  | 495 | 234 | 484 | 536 | 360 | 490 | 93 | 245   | 280 | 320   | M14 | 396   | 424 | 438   | 400 | 400 |
| FNDP 250/M      | 453                   | 920  | 500 | 271 | 484 | 536 | 360 | 490 | 93 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 400 | 400 |
| FNDP 350/M      | 481                   | 1025 | 535 | 334 | 537 | 565 | 490 | 495 | 75 | 350   | 350 | 450   | M14 | 552   | 552 | 580   | 400 | 400 |
| FNDP 450/M      | 481                   | 1025 | 560 | 380 | 571 | 571 | 490 | 635 | 57 | 390   | 390 | 450   | M14 | 552   | 552 | 580   | 520 | 400 |
| FNDP 550/M      | 481                   | 1025 | 560 | 380 | 661 | 571 | 490 | 635 | 57 | 390   | 410 | 450   | M14 | 552   | 552 | 580   | 520 | 400 |

# ГОРЕЛКИ ДЛЯ ГАЗА GAS BURNERS



3



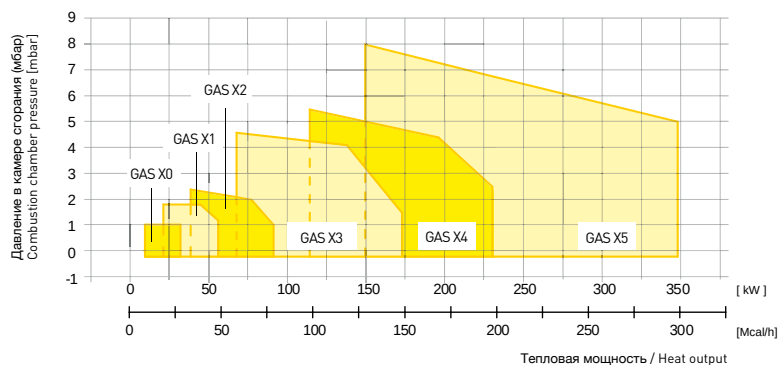
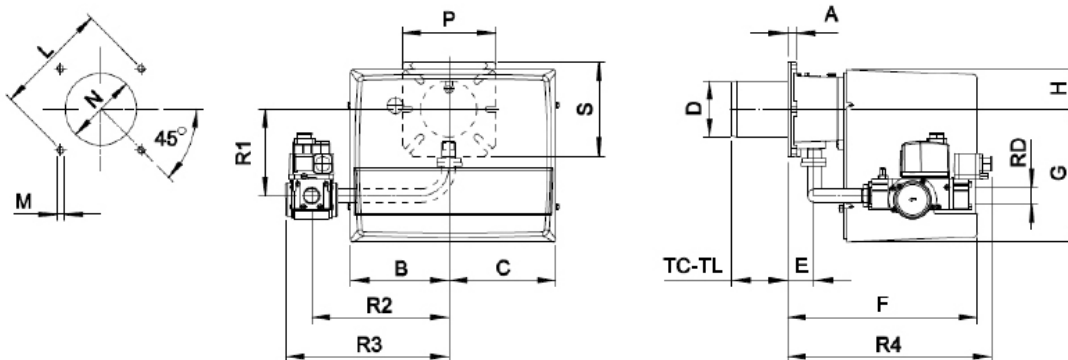




| ОДНОСТУПЕНЧАТЫЕ<br>1 STAGE | kcal/h  |         | kW   |      | 1F |
|----------------------------|---------|---------|------|------|----|
|                            | min     | max     | min  | max  |    |
| GAS X 0                    | 10.000  | 29.500  | 11,6 | 34,2 | 1F |
| GAS X 1                    | 20.000  | 50.000  | 23,2 | 58   |    |
| GAS X 2                    | 35.000  | 80.000  | 40,6 | 93   |    |
| GAS X 3 *                  | 60.000  | 150.000 | 70   | 174  |    |
| GAS X 4 *                  | 100.000 | 200.000 | 116  | 232  |    |
| GAS X 5 *                  | 130.000 | 300.000 | 151  | 349  |    |

\* Имеются также в версии Low Nox  
\* Available also in Low NOx version

ТЕПЛОВЫЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



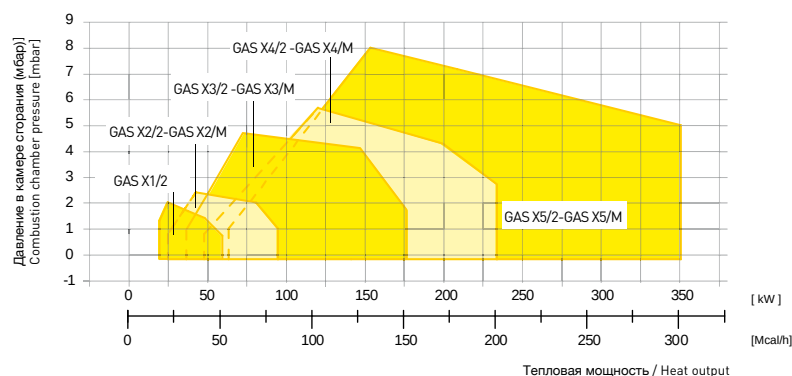
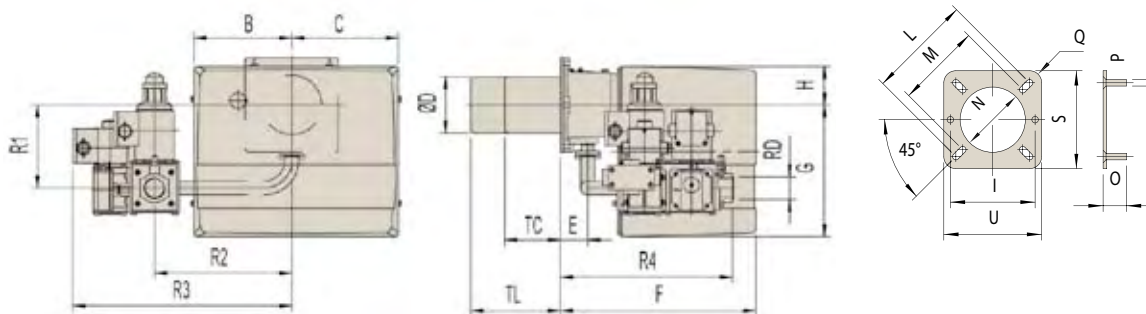
| МОДЕЛЬ<br>MODEL        |    |     |     |     |    |     |     |    |       |     |       |     |       |     |       |     |     |     |     |     | * советовав/Suggested |     |     |       |
|------------------------|----|-----|-----|-----|----|-----|-----|----|-------|-----|-------|-----|-------|-----|-------|-----|-----|-----|-----|-----|-----------------------|-----|-----|-------|
|                        | A  | B   | C   | D   | E  | F   | G   | H  | L min | L*  | L max | M   | N min | N*  | N max | P   | S   | TC  | TL  | R1  | R2                    | R3  | R4  | RD    |
| GAS X0 CE - D1/2"-S    | 15 | 140 | 140 | 90  | 43 | 265 | 169 | 72 | 130   | 150 | 170   | M8  | 100   | 110 | 130   | 150 | 150 | 90  | 150 | 132 | 200                   | 254 | 240 | 1/2"  |
| GAS X1 CE - D1/2"-S    | 15 | 162 | 175 | 90  | 43 | 305 | 210 | 65 | 130   | 150 | 170   | M8  | 100   | 110 | 130   | 150 | 150 | 90  | 150 | 132 | 200                   | 254 | 240 | 1/2"  |
| GAS X2 CE - D3/4"-S    | 15 | 162 | 175 | 90  | 43 | 305 | 210 | 65 | 130   | 150 | 170   | M8  | 100   | 110 | 130   | 150 | 150 | 90  | 150 | 138 | 220                   | 262 | 328 | 3/4"  |
| GAS X3 CE - D1"-S      | 16 | 185 | 195 | 108 | 54 | 340 | 248 | 70 | 150   | 170 | 170   | M8  | 120   | 130 | 140   | 190 | 150 | 130 | 250 | 168 | 280                   | 337 | 361 | 1"    |
| GAS X4 CE - D1"-S      | 20 | 185 | 195 | 125 | 78 | 368 | 248 | 70 | 170   | 205 | 226   | M10 | 130   | 140 | 160   | 200 | 200 | 160 | 280 | 173 | 280                   | 337 | 385 | 1"    |
| GAS X5 CE - D1"-S      | 18 | 207 | 213 | 138 | 98 | 462 | 310 | 90 | 205   | 205 | 226   | M10 | 150   | 150 | 180   | 200 | 200 | 250 | 335 | 160 | 305                   | 362 | 403 | 1"    |
| GAS X5 CE - CT-D1"-S   | 18 | 207 | 213 | 138 | 98 | 462 | 310 | 90 | 205   | 205 | 226   | M10 | 150   | 150 | 180   | 200 | 200 | 250 | 335 | 160 | 305                   | 480 | 403 | 1"    |
| GAS X5 CE - D1"1/4-S   | 18 | 207 | 213 | 138 | 98 | 462 | 310 | 90 | 205   | 205 | 226   | M10 | 150   | 150 | 180   | 200 | 200 | 250 | 335 | 160 | 305                   | 362 | 450 | 1"1/4 |
| GAS X5 CE - CTD1"1/4-S | 18 | 207 | 213 | 138 | 98 | 462 | 310 | 90 | 205   | 205 | 226   | M10 | 150   | 150 | 180   | 200 | 200 | 250 | 335 | 160 | 305                   | 480 | 450 | 1"1/4 |



| ДВУХСТУПЕНЧАТЫЕ<br>2 STAGES | ПРОГРЕССИВНЫЕ И МОДУЛИРУЮЩИЕ<br>PROGRESSIVE & MODULATING | kcal/h  |         | kW   |     |    |
|-----------------------------|----------------------------------------------------------|---------|---------|------|-----|----|
|                             |                                                          | min     | max     | min  | max |    |
| GAS X 1/2                   |                                                          | 20.000  | 50.000  | 23,2 | 58  | 1F |
| GAS X 2/2                   | GAS X 2/M                                                | 35.000  | 80.000  | 40,6 | 93  |    |
| GAS X 3/2 *                 | GAS X 3/M *                                              | 60.000  | 150.000 | 70   | 174 |    |
| GAS X 4/2 *                 | GAS X 4/M *                                              | 100.000 | 200.000 | 116  | 232 |    |
| GAS X 5/2 *                 | GAS X 5/M *                                              | 130.000 | 300.000 | 151  | 349 |    |

\* Имеются также в версии Low Nox  
\* Available also in Low NOx version

## ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)

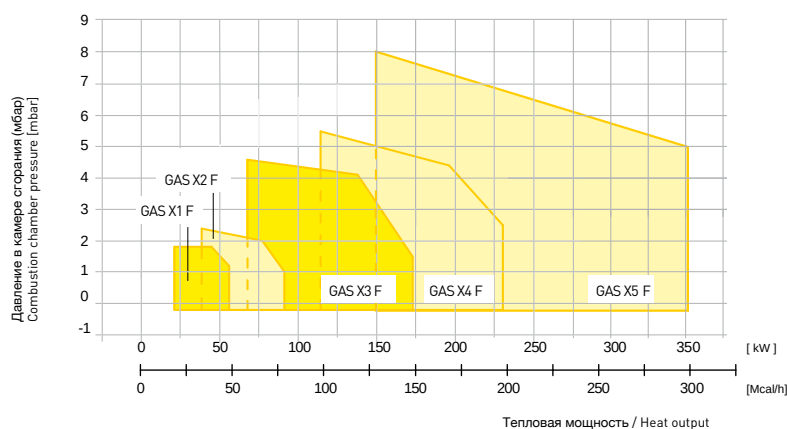
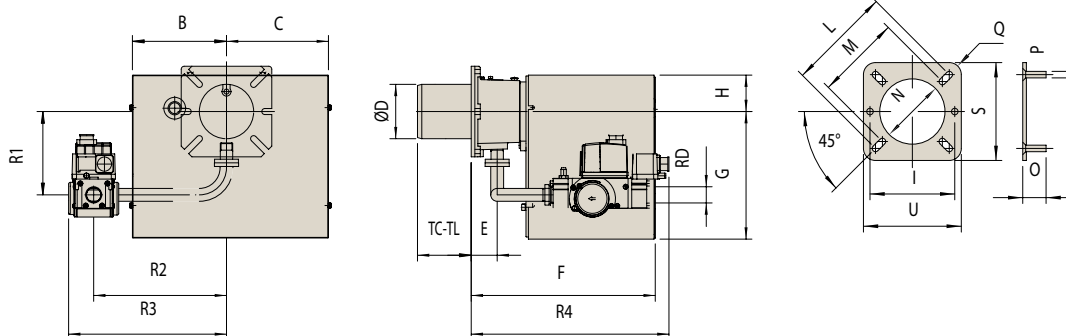


| МОДЕЛЬ<br>MODEL             | B   | C   | D   | E  | F   | G   | H   | I   | L   | M   | N   | O  | P   | Q   | S   | U   | TC  | TL  | R1  | R2  | R3  | R4  | RD    |
|-----------------------------|-----|-----|-----|----|-----|-----|-----|-----|-----|-----|-----|----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-------|
| GAS X 1/2 CE - D1/2" S      | 157 | 170 | 90  | 45 | 313 | 210 | 65  | 130 | 160 | 130 | 100 | 30 | M8  | R15 | 150 | 150 | 85  | 145 | 133 | 200 | 275 | 258 | 1/2   |
| GAS X 2/2 CE - D3/4" FS25   | 157 | 170 | 90  | 45 | 313 | 210 | 65  | 130 | 160 | 130 | 100 | 30 | M8  | R15 | 150 | 150 | 85  | 145 | 138 | 220 | 351 | 275 | 1     |
| GAS X 3/2 CE - D1" S        | 185 | 195 | 108 | 52 | 340 | 248 | 70  | 160 | 170 | 150 | 120 | 30 | M8  | R15 | 190 | 190 | 130 | 250 | 168 | 280 | 337 | 361 | 1     |
| GAS X 4/2 CE - D1" S        | 185 | 195 | 125 | 78 | 368 | 248 | 70  | -   | 226 | 170 | 135 | 40 | M10 | R30 | 220 | 220 | 160 | 280 | 173 | 280 | 337 | 385 | 1     |
| GAS X 5/2 CE - D1" S        | 207 | 213 | 138 | 98 | 462 | 310 | 90  | -   | 226 | 205 | 148 | 40 | M10 | R30 | 220 | 220 | 250 | 335 | 255 | 305 | 362 | 403 | 1"    |
| GAS X 5/2 CE - CT D1" S     | 207 | 213 | 138 | 98 | 462 | 310 | 90  | -   | 226 | 205 | 148 | 40 | M10 | R30 | 220 | 220 | 250 | 335 | 255 | 305 | 480 | 403 | 1"    |
| GAS X 5/2 CE - D1" 1/4 S    | 207 | 213 | 138 | 98 | 462 | 310 | 90  | -   | 226 | 205 | 148 | 40 | M10 | R30 | 220 | 220 | 250 | 335 | 255 | 305 | 362 | 450 | 1"1/4 |
| GAS X 5/2 CE - CT D1" 1/4 S | 207 | 213 | 138 | 98 | 462 | 310 | 90  | -   | 226 | 205 | 148 | 40 | M10 | R30 | 220 | 220 | 250 | 335 | 255 | 305 | 480 | 450 | 1"1/4 |
| GAS X 2/M CE - D3/4" S      | 157 | 200 | 90  | 45 | 305 | 211 | 65  | 130 | 160 | 130 | 100 | 30 | M8  | R15 | 150 | 150 | 89  | 149 | 178 | 220 | 262 | 328 | 3/4"  |
| GAS X 3/M CE - D1" S        | 185 | 224 | 108 | 54 | 340 | 248 | 70  | 160 | 170 | 150 | 120 | 30 | M8  | R15 | 190 | 190 | 130 | 250 | 228 | 280 | 338 | 360 | 1"    |
| GAS X 4/M CE - D1" S        | 185 | 224 | 125 | 78 | 368 | 248 | 70  | -   | 226 | 170 | 135 | 40 | M10 | R30 | 220 | 220 | 160 | 280 | 233 | 280 | 338 | 385 | 1"    |
| GAS X 5/M CE - D1" S        | 207 | 213 | 138 | 98 | 462 | 310 | 165 | -   | 226 | 205 | 148 | 40 | M10 | R30 | 220 | 220 | 250 | 335 | 160 | 305 | 395 | 508 | 1"    |
| GAS X5/M CE - D1" 1/4 S     | 207 | 213 | 138 | 98 | 462 | 310 | 165 | -   | 226 | 205 | 148 | 40 | M10 | R30 | 220 | 220 | 250 | 335 | 160 | 305 | 395 | 508 | 1"1/4 |



| ОДНОСТУПЕНЧАТЫЕ для хлебопекарных печей<br>1 STAGE for bakery ovens | kcal/h  |         | kW   |     |    |
|---------------------------------------------------------------------|---------|---------|------|-----|----|
|                                                                     | min     | max     | min  | max |    |
| GAS X 1 F                                                           | 20.000  | 50.000  | 23,2 | 58  | 1F |
| GAS X 2 F                                                           | 35.000  | 80.000  | 40,6 | 93  |    |
| GAS X 3 F                                                           | 60.000  | 150.000 | 70   | 174 |    |
| GAS X 4 F                                                           | 100.000 | 200.000 | 116  | 232 |    |
| GAS X 5 F                                                           | 130.000 | 300.000 | 151  | 349 |    |

ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL        | B   | C   | D   | E  | F   | G   | H  | I   | L   | M   | N   | O  | P   | Q   | S   | U   | TC  | TL  | R1  | R2  | R3  | R4  | RD   |
|------------------------|-----|-----|-----|----|-----|-----|----|-----|-----|-----|-----|----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|------|
| GAS X 1 CE F - D1/2" S | 157 | 170 | 90  | 45 | 305 | 210 | 65 | 130 | 160 | 130 | 100 | 30 | M8  | R15 | 150 | 150 | 85  | 145 | 128 | 200 | 254 | 244 | 1/2" |
| GAS X 2 CE F - D3/4" S | 157 | 170 | 90  | 45 | 305 | 210 | 65 | 130 | 160 | 130 | 100 | 30 | M8  | R15 | 150 | 150 | 85  | 145 | 138 | 220 | 262 | 328 | 3/4" |
| GAS X 3 CE F - D1" S   | 185 | 195 | 108 | 52 | 340 | 248 | 70 | 160 | 170 | 150 | 120 | 30 | M8  | R15 | 190 | 190 | 130 | 250 | 168 | 280 | 337 | 361 | 1"   |
| GAS X 4 CE F - D1" S   | 185 | 195 | 125 | 78 | 368 | 248 | 70 | -   | 226 | 170 | 135 | 40 | M10 | R30 | 220 | 220 | 160 | 280 | 173 | 280 | 337 | 385 | 1"   |
| GAS X5 CE F - D1" S    | 207 | 213 | 138 | 98 | 462 | 310 | 90 | -   | 226 | 205 | 148 | 40 | M10 | R30 | 220 | 220 | 250 | 335 | 160 | 305 | 362 | 403 | 1"   |



### ОДНОСТУПЕНЧАТЫЕ для кухонь 1 STAGE for kitchens

|  | kcal/h |     | kW  |     |  |
|--|--------|-----|-----|-----|--|
|  | min    | max | min | max |  |

|         |        |        |      |    |    |
|---------|--------|--------|------|----|----|
| GAS 1/C | 10.000 | 40.000 | 11,6 | 47 | 1F |
| GAS 2/C | 15.000 | 60.000 | 17,5 | 70 |    |

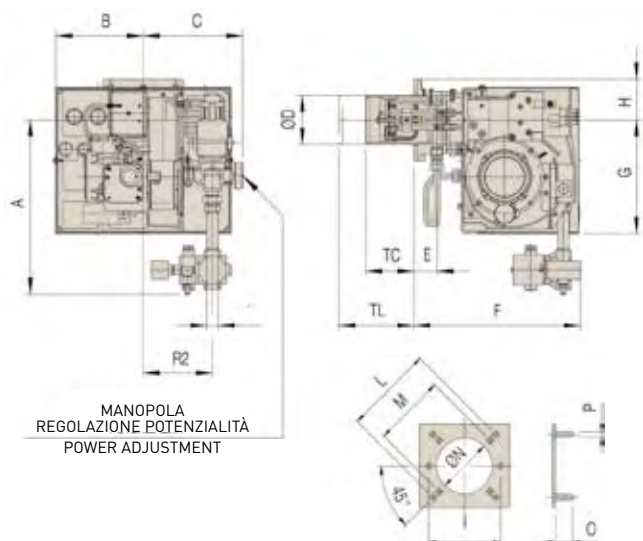
### СЕРИЯ "X0 THLS" для кухонь "X0 THLS" SERIE for units

|  | kcal/h |     | kW  |     |  |
|--|--------|-----|-----|-----|--|
|  | min    | max | min | max |  |

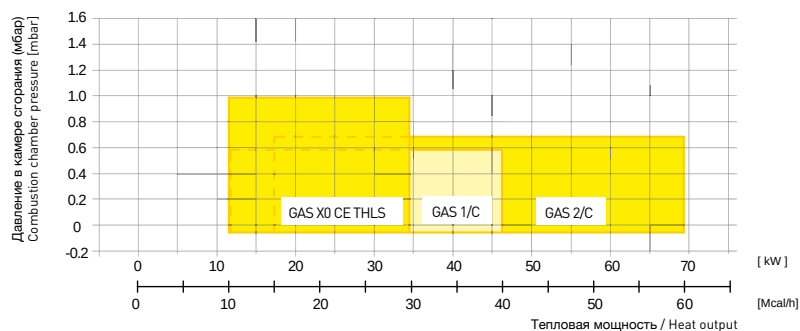
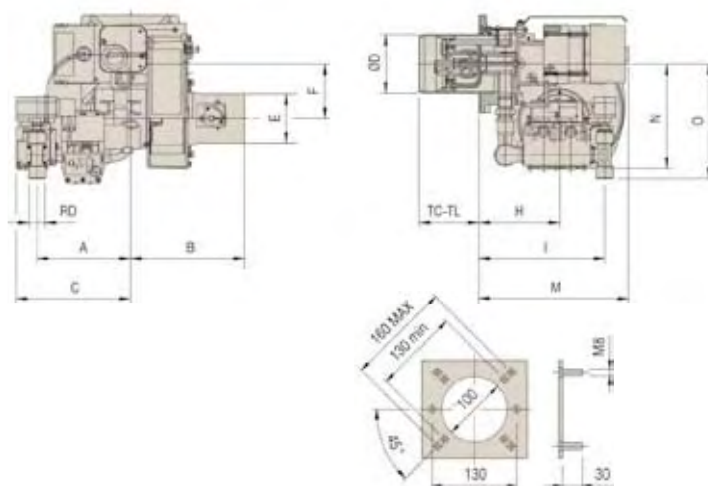
|             |        |        |      |      |    |
|-------------|--------|--------|------|------|----|
| GAS X0 THLS | 10.000 | 29.500 | 11,6 | 34,2 | 1F |
|-------------|--------|--------|------|------|----|

## ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)

### GAS 1/C - GAS 2/C



### GAS X0 THLS



| МОДЕЛЬ<br>MODEL | A   | B   | C   | D  | E  | F   | G   | H  | I   | L   | M   | N   | O  | P  | TC | TL  | R2  |      |
|-----------------|-----|-----|-----|----|----|-----|-----|----|-----|-----|-----|-----|----|----|----|-----|-----|------|
| GAS 1/C         | 321 | 166 | 184 | 90 | 43 | 310 | 210 | 75 | 130 | 160 | 130 | 100 | 30 | M8 | 85 | 145 | 128 | 1/2" |
| GAS 2/C         | 321 | 166 | 184 | 90 | 43 | 310 | 210 | 75 | 130 | 160 | 130 | 100 | 30 | M8 | 85 | 145 | 128 | 1/2" |

| МОДЕЛЬ<br>MODEL        | A   | B   | C   | D  | E  | F  | H   | I   | TC | TL  | M   | N   | O   | RD   |
|------------------------|-----|-----|-----|----|----|----|-----|-----|----|-----|-----|-----|-----|------|
| GAS X0 CE THLS - D1/2" | 144 | 169 | 176 | 90 | 80 | 84 | 125 | 193 | 92 | 152 | 230 | 161 | 176 | 1/2" |

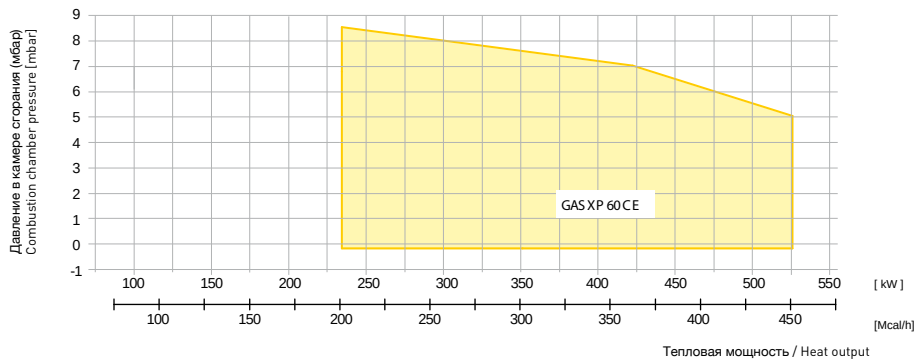
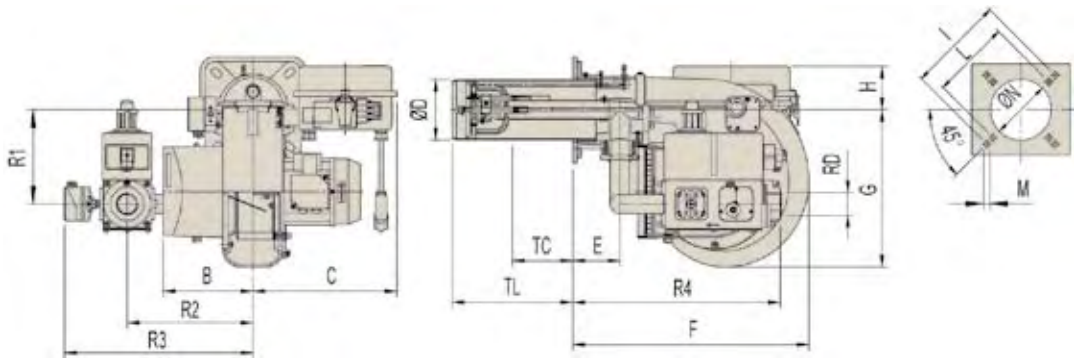




| ОДНОСТУПЕНЧАТЫЕ<br>1 STAGE | kcal/h  |         | kW  |     | 3F |
|----------------------------|---------|---------|-----|-----|----|
|                            | min     | max     | min | max |    |
| GAS XP 60 *                | 200.000 | 450.000 | 232 | 522 | 3F |

\* Имеются также в версии Low Nox  
\* Available also in Low NOx version

ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL               | B   | C   | D   | E  | F   | G   | H  | I   | L   | M   | N   | TC  | TL  | R1  | R2  | R3  | R4  | RD     |
|-------------------------------|-----|-----|-----|----|-----|-----|----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|--------|
| GASP XR 60 CE - D1" - FS32    | 188 | 301 | 150 | 98 | 493 | 327 | 90 | 226 | 205 | M10 | 160 | 250 | 335 | 171 | 280 | 378 | 354 | 1"     |
| GAS XR 60 CE - D1" 1/2 - FS40 | 188 | 301 | 150 | 98 | 493 | 327 | 90 | 226 | 205 | M10 | 160 | 250 | 335 | 203 | 280 | 420 | 456 | 1" 1/2 |
| GAS XR 60 CE - D1" 1/2 - FS50 | 188 | 301 | 150 | 98 | 493 | 327 | 90 | 226 | 205 | M10 | 160 | 250 | 335 | 203 | 280 | 420 | 456 | 1" 1/2 |

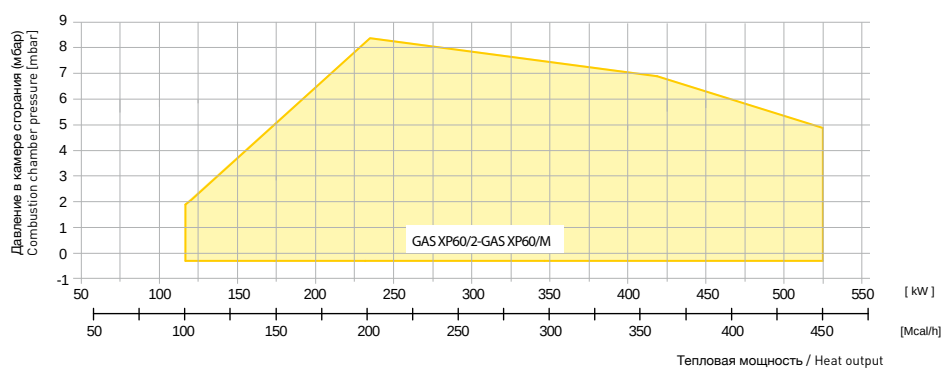
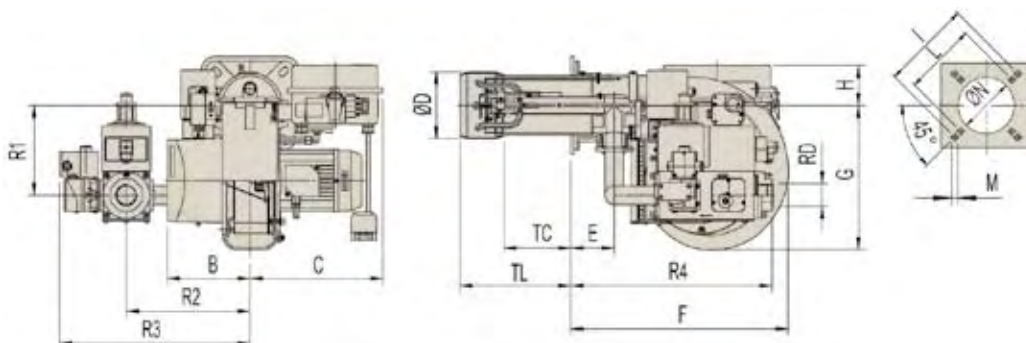


| ДВУХСТУПЕНЧАТЫЕ<br>2 STAGES | ПРОГРЕССИВНЫЕ И<br>МОДУЛИРУЮЩИЕ<br>PROGRESSIVE<br>& MODULATING | kcal/h  |         | kW  |     |    |
|-----------------------------|----------------------------------------------------------------|---------|---------|-----|-----|----|
|                             |                                                                | min     | max     | min | max |    |
| GAS XP 60/2 *               | GAS XP 60/M *                                                  | 200.000 | 450.000 | 232 | 522 | 3F |

\* Имеются также в версии Low Nox

\* Available also in Low NOx version

### ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



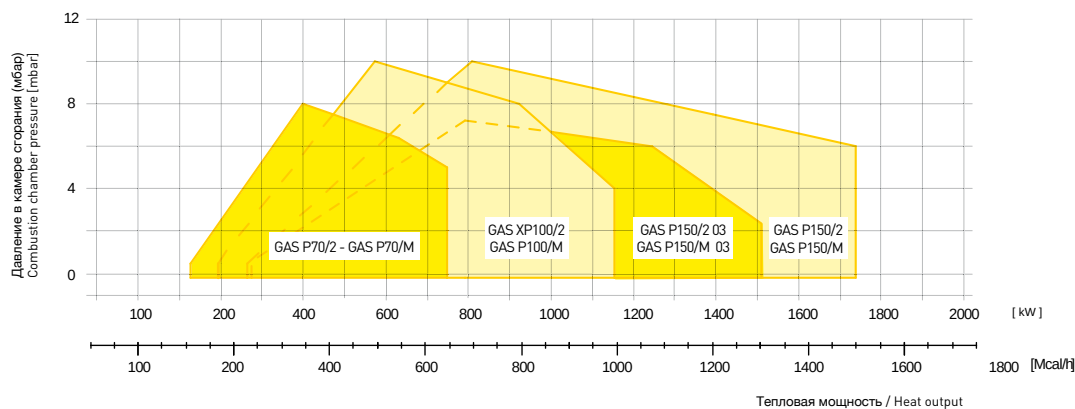
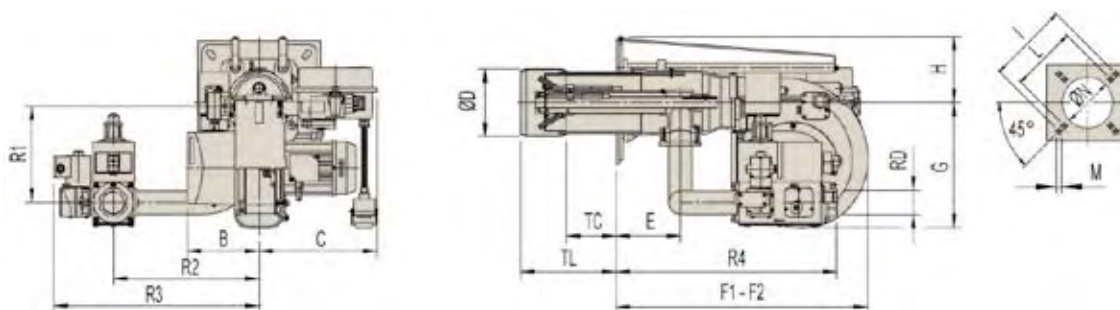
| МОДЕЛЬ<br>MODEL                 | B   | C   | D   | E  | F   | G   | H  | I   | L   | M   | N   | TC  | TL  | R1  | R2  | R3  | R4  | RD     |
|---------------------------------|-----|-----|-----|----|-----|-----|----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|--------|
| GASP XP 60/2 CE - D1" - FS32    | 188 | 301 | 150 | 98 | 493 | 327 | 90 | 226 | 205 | M10 | 160 | 250 | 335 | 171 | 280 | 411 | 354 | 1"     |
| GAS XP 60/2 CE - D1" 1/2 - FS40 | 188 | 301 | 150 | 98 | 493 | 327 | 90 | 226 | 205 | M10 | 160 | 250 | 335 | 203 | 280 | 432 | 456 | 1" 1/2 |
| GAS XP 60/2 CE - D1" 1/2 - FS50 | 188 | 301 | 150 | 98 | 493 | 327 | 90 | 226 | 205 | M10 | 160 | 250 | 335 | 203 | 280 | 432 | 456 | 1" 1/2 |
| GASP XP 60/M CE - D1" - FS32    | 331 | 301 | 150 | 98 | 493 | 327 | 90 | 226 | 205 | M10 | 160 | 250 | 335 | 203 | 411 | 508 | 390 | 1"     |
| GAS XP 60/M CE - D1" 1/2 - FS40 | 331 | 301 | 150 | 98 | 493 | 327 | 90 | 226 | 205 | M10 | 160 | 250 | 335 | 203 | 411 | 550 | 468 | 1" 1/2 |
| GAS XP 60/M CE - D1" 1/2 - FS50 | 331 | 301 | 150 | 98 | 493 | 327 | 90 | 226 | 205 | M10 | 160 | 250 | 335 | 203 | 411 | 550 | 468 | 1" 1/2 |



| ДВУХСТУПЕНЧАТЫЕ<br>2 STAGES | ПРОГРЕССИВНЫЕ И<br>МОДУЛИРУЮЩИЕ<br>PROGRESSIVE<br>& MODULATING | kcal/h  |           | kW  |      | 3F |
|-----------------------------|----------------------------------------------------------------|---------|-----------|-----|------|----|
|                             |                                                                | min     | max       | min | max  |    |
| GAS P 70/2*                 | GAS P 70/M*                                                    | 350.000 | 650.000   | 406 | 754  | 3F |
| GAS P 100/2*                | GAS P 100/M*                                                   | 500.000 | 1.000.000 | 580 | 1160 |    |
| GAS P 150/2*                | GAS P 150/M*                                                   | 700.000 | 1.500.000 | 814 | 1744 |    |

\* Имеются также в версии Low Nox  
\* Available also in Low NOx version

### ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL                 | F2= размер при отведенной назад горелке<br>F2= overall dimension with the burner out in position of maintenance |     |     |     |     |      |     |     |     |     |     |     |     |     |     |     |     |     |        |
|---------------------------------|-----------------------------------------------------------------------------------------------------------------|-----|-----|-----|-----|------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|--------|
|                                 | B                                                                                                               | C   | D   | E   | F1  | F2   | G   | H   | I   | L   | M   | N   | TC  | TL  | R1  | R2  | R3  | R4  | RD     |
| GAS P 70/2 CE - D1" 1/2 - FS50  | 188                                                                                                             | 308 | 175 | 168 | 660 | 1100 | 327 | 171 | 368 | 340 | M12 | 185 | 250 | 385 | 260 | 380 | 532 | 576 | 1" 1/2 |
| GAS P 70/2 CE - D2" - FS50      | 188                                                                                                             | 308 | 175 | 168 | 660 | 1100 | 327 | 171 | 368 | 340 | M12 | 185 | 250 | 385 | 260 | 380 | 536 | 576 | 2"     |
| GAS P 100/2 CE - D1" 1/2 - FS50 | 238                                                                                                             | 373 | 185 | 184 | 660 | 1160 | 438 | 173 | 368 | 340 | M12 | 195 | 250 | 385 | 260 | 380 | 532 | 591 | 1" 1/2 |
| GAS P 100/2 CE - D2" - FS50     | 238                                                                                                             | 373 | 185 | 184 | 660 | 1160 | 438 | 173 | 368 | 340 | M12 | 195 | 250 | 385 | 260 | 380 | 536 | 591 | 2"     |
| GAS P 100/2 CE - DN65 - FS65    | 238                                                                                                             | 373 | 185 | 184 | 660 | 1160 | 438 | 173 | 368 | 340 | M12 | 195 | 250 | 385 | 260 | 380 | 540 | 630 | DN65   |
| GAS P 150/2 CE - D2" - FS50     | 238                                                                                                             | 376 | 210 | 193 | 800 | 1380 | 438 | 213 | 368 | 340 | M14 | 220 | 280 | 400 | 284 | 380 | 552 | 600 | 2"     |
| GAS P 150/2 CE - DN65 - FS65    | 238                                                                                                             | 376 | 210 | 193 | 800 | 1380 | 438 | 213 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 340 | 495 | 585 | DN65   |
| GAS P 150/2 CE - DN80-FS80      | 238                                                                                                             | 376 | 210 | 193 | 800 | 1380 | 438 | 213 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 420 | 590 | 605 | DN80   |
| GAS P 70/M CE - D1" 1/2 - FS50  | 331                                                                                                             | 362 | 175 | 168 | 660 | 1100 | 327 | 171 | 368 | 340 | M12 | 185 | 250 | 385 | 260 | 415 | 553 | 538 | 1" 1/2 |
| GAS P 70/M CE - D2" - FS50      | 331                                                                                                             | 362 | 175 | 168 | 660 | 1100 | 327 | 171 | 368 | 340 | M12 | 185 | 250 | 385 | 260 | 415 | 553 | 538 | 2"     |
| GAS P 100/M CE - D1" 1/2 - FS50 | 376                                                                                                             | 372 | 185 | 184 | 660 | 1160 | 438 | 173 | 368 | 340 | M12 | 195 | 250 | 385 | 260 | 460 | 600 | 554 | 1" 1/2 |
| GAS P 100/M CE - D2" - FS50     | 376                                                                                                             | 372 | 185 | 184 | 660 | 1160 | 438 | 173 | 368 | 340 | M12 | 195 | 250 | 385 | 260 | 460 | 600 | 554 | 2"     |
| GAS P 100/M CE - DN65 - FS65    | 376                                                                                                             | 372 | 185 | 184 | 660 | 1160 | 438 | 173 | 368 | 340 | M12 | 195 | 250 | 385 | 260 | 500 | 592 | 580 | DN65   |
| GAS P 150/M CE - D2" - FS50     | 376                                                                                                             | 372 | 209 | 193 | 800 | 1380 | 438 | 213 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 510 | 673 | 552 | 2"     |
| GAS P 150/M CE - DN65 - FS65    | 376                                                                                                             | 372 | 209 | 193 | 800 | 1380 | 438 | 213 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 510 | 665 | 590 | DN65   |
| GAS P 150/M CE - DN80-FS80      | 376                                                                                                             | 372 | 209 | 193 | 800 | 1380 | 438 | 213 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 550 | 720 | 630 | DN80   |



| ДВУХСТУПЕНЧАТЫЕ<br>2 STAGES | ПРОГРЕССИВНЫЕ И<br>МОДУЛИРУЮЩИЕ<br>PROGRESSIVE<br>& MODULATING | kcal/h    |           | kW   |      | 3F |
|-----------------------------|----------------------------------------------------------------|-----------|-----------|------|------|----|
|                             |                                                                | min       | max       | min  | max  |    |
| GAS P 190/2*                | GAS P 190/M **                                                 | 900.000   | 1.900.000 | 1044 | 2209 |    |
| GAS P 250/2*                | GAS P 250/M **                                                 | 1.000.000 | 2.500.000 | 1160 | 2900 |    |

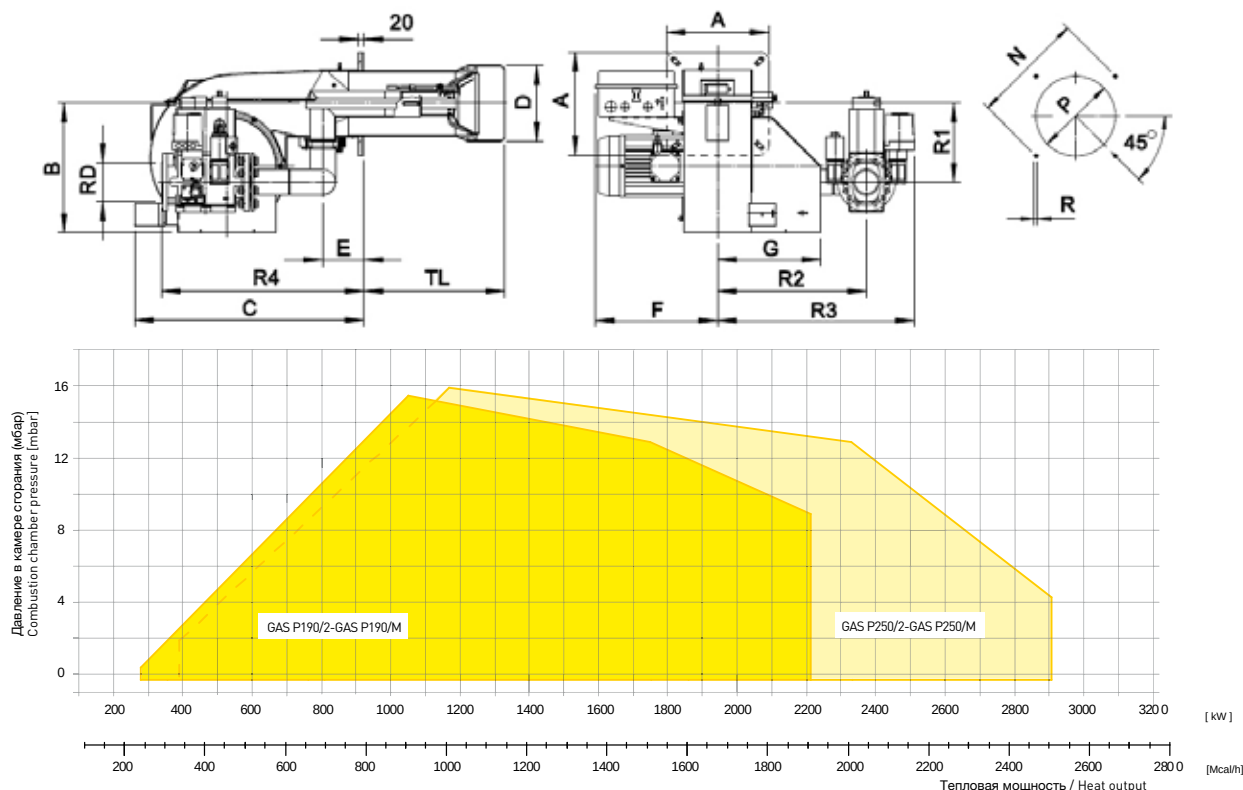
\* Имеются также в версии Low Nox

\* Available also in Low NOx version

\*\* Поставляются также версии с ИНВЕРТОРОМ и ЭЛЕКТРОННЫМ КУЛАЧКОМ

\*\* Available also versions with INVERTER and ELECTRONIC BURNER CONTROL

## ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL                | * советова/ Suggested |     |      |     |     |     |     |     |       |     |       |       |     |       |     |     |     |     |     |       |
|--------------------------------|-----------------------|-----|------|-----|-----|-----|-----|-----|-------|-----|-------|-------|-----|-------|-----|-----|-----|-----|-----|-------|
|                                | A                     | B   | C    | D   | E   | F   | G   | TL  | N min | N*  | N max | P min | P*  | P max | R   | R1  | R2  | R3  | R4  | RD    |
| GAS P 190/2 CE - D2" - FS50    | 360                   | 453 | 806  | 265 | 145 | 430 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 275 | 570 | 734 | 656 | 2"    |
| GAS P 190/2 CE - DN65 - FS65   | 360                   | 453 | 806  | 265 | 145 | 430 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 275 | 570 | 724 | 688 | DN65  |
| GAS P 190/2 CE - DN80 - FS80   | 360                   | 453 | 806  | 265 | 145 | 430 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 275 | 570 | 736 | 708 | DN 80 |
| GAS P 190/2 CE - DN100 - FS100 | 360                   | 453 | 806  | 265 | 145 | 430 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 275 | 570 | 745 | 748 | DN100 |
| GAS P 250/2 CE - D2" - FS50    | 360                   | 453 | 806  | 270 | 145 | 430 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 275 | 570 | 734 | 656 | 2"    |
| GAS P 250/2 CE - DN65 - FS65   | 360                   | 453 | 806  | 270 | 145 | 430 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 275 | 570 | 724 | 688 | DN65  |
| GAS P 250/2 CE - DN80 - FS80   | 360                   | 453 | 806  | 270 | 145 | 430 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 275 | 570 | 736 | 708 | DN80  |
| GAS P 250/2 CE - DN100 - FS100 | 360                   | 453 | 806  | 270 | 145 | 430 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 275 | 570 | 745 | 748 | DN100 |
| GAS P 190/M CE - D2" - FS50    | 360                   | 453 | 1010 | 265 | 145 | 432 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 254 | 509 | 672 | 504 | 2"    |
| GAS P 190/M CE - DN65 - FS65   | 360                   | 453 | 1010 | 265 | 145 | 432 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 254 | 480 | 634 | 688 | DN65  |
| GAS P 190/M CE - DN80 - FS80   | 360                   | 453 | 1010 | 265 | 145 | 432 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 254 | 480 | 647 | 708 | DN80  |
| GAS P 190/M CE - DN100 - FS100 | 360                   | 453 | 1010 | 265 | 145 | 432 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 254 | 480 | 654 | 748 | DN100 |
| GAS P 250/M CE - D2" - FS50    | 360                   | 453 | 1010 | 270 | 145 | 432 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 254 | 509 | 672 | 504 | 2"    |
| GAS P 250/M CE - DN65 - FS65   | 360                   | 453 | 1010 | 270 | 145 | 432 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 254 | 480 | 634 | 688 | DN65  |
| GAS P 250/M CE - DN80 - FS80   | 360                   | 453 | 1010 | 270 | 145 | 432 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 254 | 480 | 647 | 708 | DN80  |
| GAS P 250/M CE - DN100 - FS100 | 360                   | 453 | 1010 | 270 | 145 | 432 | 363 | 495 | 396   | 424 | 438   | 280   | 280 | 320   | M14 | 254 | 480 | 654 | 748 | DN100 |



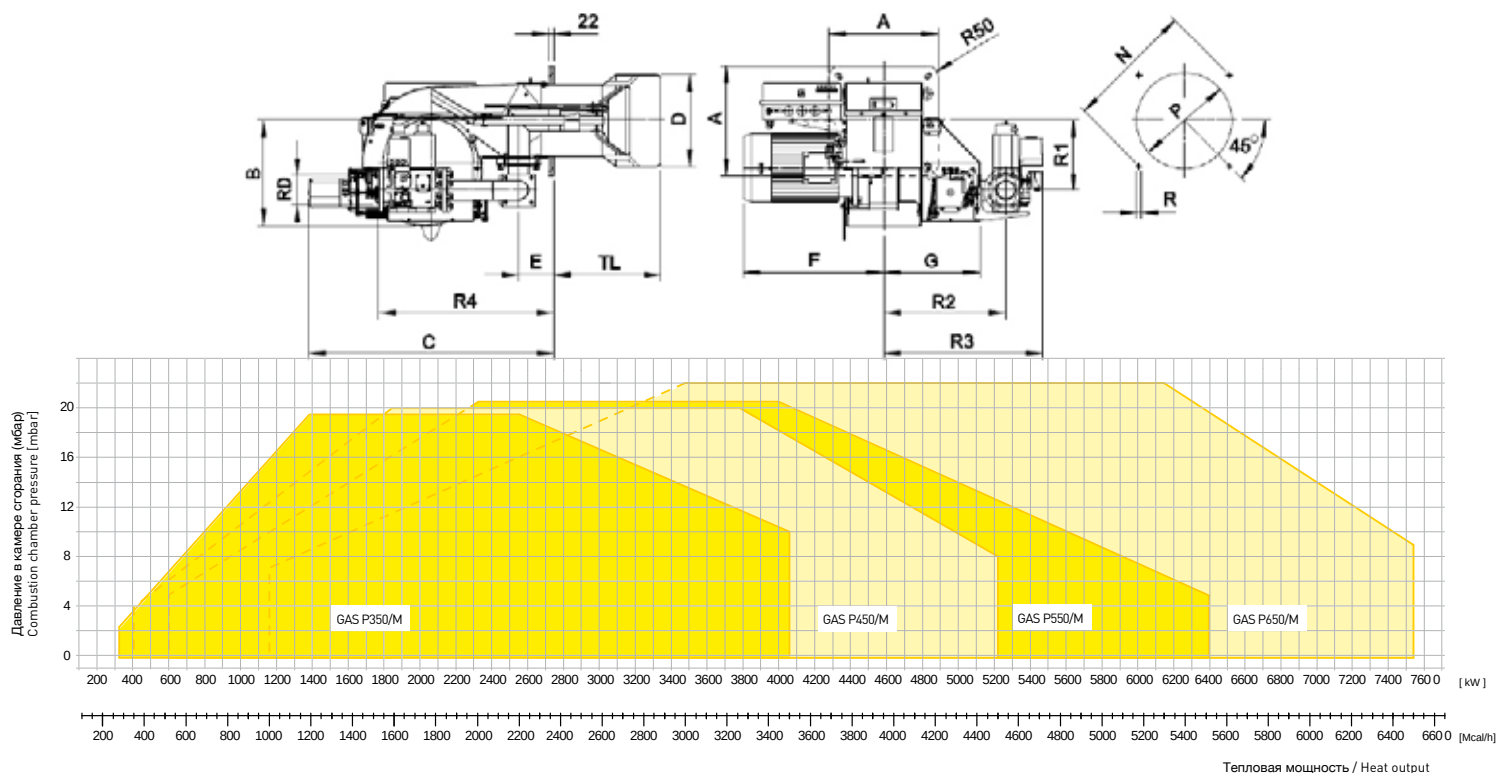


| ПРОГРЕССИВНЫЕ И МОДУЛИРУЮЩИЕ<br>PROGRESSIVE & MODULATING | kcal/h    |            | kW   |       |    |
|----------------------------------------------------------|-----------|------------|------|-------|----|
|                                                          | min       | max        | min  | max   |    |
| GAS P 350/M *                                            | 1.200.000 | 3.500.000  | 1392 | 4060  | 3F |
| GAS P 450/M *                                            | 1.600.000 | 4.500.000  | 1856 | 5220  |    |
| GAS P 550/M *                                            | 2.000.000 | 5.500.000  | 2320 | 6380  |    |
| GAS P 650/M *                                            | 3.000.000 | 6.500.000  | 3488 | 7558  |    |
| GAS P 750/M *                                            | 3.500.000 | 7.500.000  | 4070 | 8721  |    |
| GAS P 1000/M *                                           | 3.440.000 | 10.000.000 | 4000 | 11628 |    |

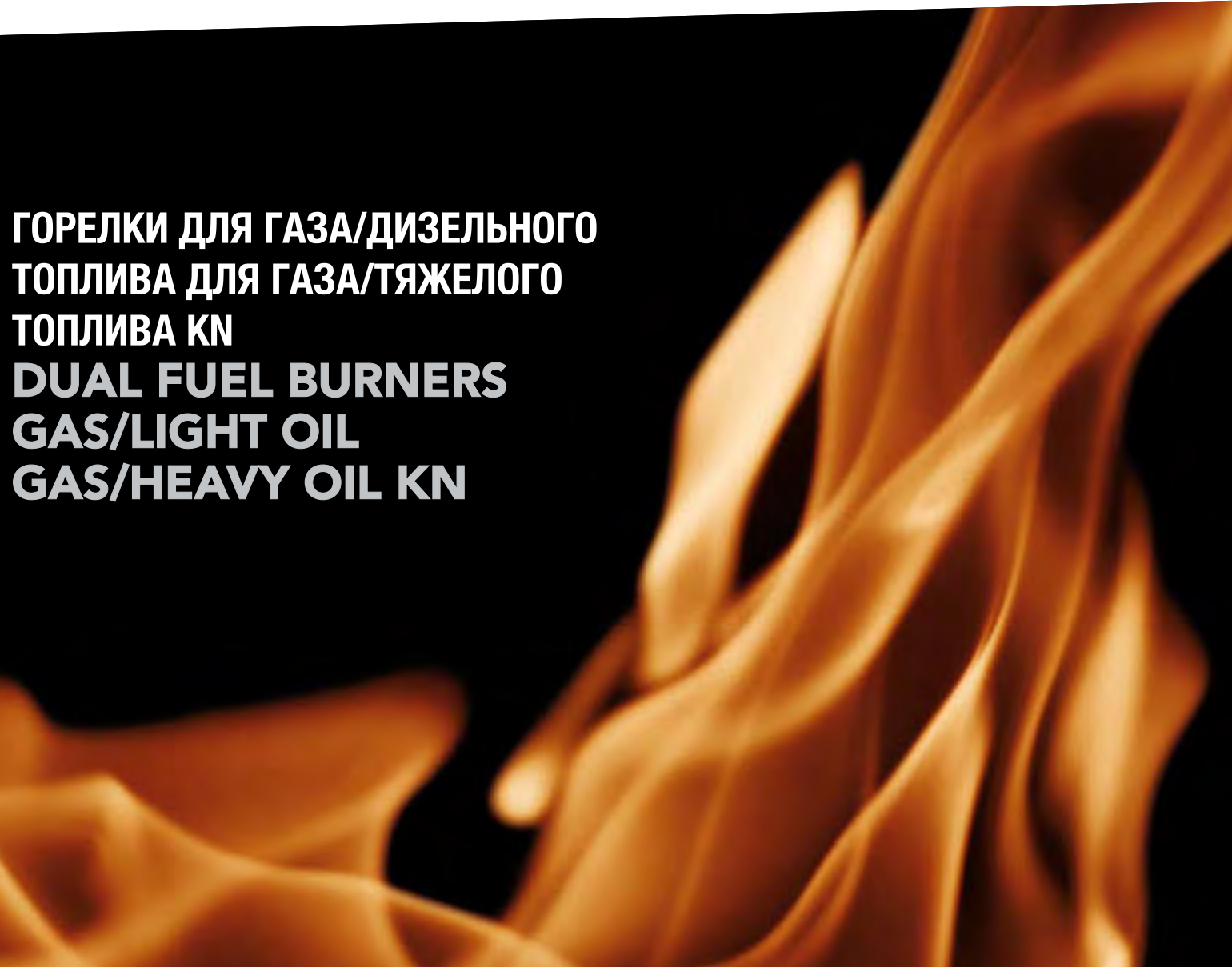
\* Поставляются также версии с ИНВЕРТОРОМ и ЭЛЕКТРОННЫМ КУЛАЧКОМ

\* Available also versions with INVERTER and ELECTRONIC BURNER CONTROL

ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL                | * советоваи/Suggested |     |      |     |     |     |     |     |          |     |          |       |     |          |     |     |     |     |     |       |
|--------------------------------|-----------------------|-----|------|-----|-----|-----|-----|-----|----------|-----|----------|-------|-----|----------|-----|-----|-----|-----|-----|-------|
|                                | A                     | B   | C    | D   | E   | F   | G   | TL  | N<br>min | N*  | N<br>max | P min | P*  | P<br>max | R   | R1  | R2  | R3  | R4  | RD    |
| GAS P 350/M CE - D2"           | 490                   | 481 | 1118 | 342 | 160 | 507 | 440 | 515 | 552      | 552 | 580      | 350   | 360 | 450      | M14 | 317 | 535 | 660 | 570 | 2"    |
| GAS P 350/M CE - DN65 - FS65   | 490                   | 481 | 1118 | 342 | 160 | 507 | 440 | 515 | 552      | 552 | 580      | 350   | 360 | 450      | M14 | 317 | 560 | 714 | 780 | DN65  |
| GAS P 350/M CE - DN80 - FS80   | 490                   | 481 | 1118 | 342 | 160 | 507 | 440 | 515 | 552      | 552 | 580      | 350   | 360 | 450      | M14 | 317 | 560 | 727 | 800 | DN80  |
| GAS P 350/M CE - DN100 - FS100 | 490                   | 481 | 1118 | 342 | 160 | 507 | 440 | 515 | 552      | 552 | 580      | 350   | 360 | 450      | M14 | 317 | 590 | 765 | 840 | DN100 |
| GAS P 450/M CE - D2"           | 490                   | 481 | 1118 | 382 | 160 | 565 | 440 | 520 | 552      | 552 | 580      | 390   | 400 | 450      | M14 | 317 | 535 | 660 | 570 | 2"    |
| GAS P 450/M CE - DN65 - FS65   | 490                   | 481 | 1118 | 382 | 160 | 565 | 440 | 520 | 552      | 552 | 580      | 390   | 400 | 450      | M14 | 317 | 560 | 714 | 780 | DN65  |
| GAS P 450/M CE - DN80 - FS80   | 490                   | 481 | 1118 | 382 | 160 | 565 | 440 | 520 | 552      | 552 | 580      | 390   | 400 | 450      | M14 | 317 | 560 | 727 | 800 | DN80  |
| GAS P 450/M CE - DN100 - FS100 | 490                   | 481 | 1118 | 382 | 160 | 565 | 440 | 520 | 552      | 552 | 580      | 390   | 400 | 450      | M14 | 317 | 590 | 765 | 840 | DN100 |
| GAS P 550/M CE - D2"           | 490                   | 481 | 1118 | 402 | 160 | 661 | 440 | 520 | 552      | 552 | 580      | 410   | 420 | 450      | M14 | 317 | 535 | 660 | 570 | 2"    |
| GAS P 550/M CE - DN65 - FS65   | 490                   | 481 | 1118 | 402 | 160 | 661 | 440 | 520 | 552      | 552 | 580      | 410   | 420 | 450      | M14 | 317 | 560 | 714 | 780 | DN65  |
| GAS P 550/M CE - DN80 - FS80   | 490                   | 481 | 1118 | 402 | 160 | 661 | 440 | 520 | 552      | 552 | 580      | 410   | 420 | 450      | M14 | 317 | 560 | 727 | 800 | DN80  |
| GAS P 550/M CE - DN100 - FS100 | 490                   | 481 | 1118 | 402 | 160 | 661 | 440 | 520 | 552      | 552 | 580      | 410   | 420 | 450      | M14 | 317 | 590 | 765 | 840 | DN100 |
| GAS P 650/M CE - DN65 - FS65   | 490                   | 481 | 1118 | 420 | 160 | 705 | 440 | 490 | 552      | 552 | 580      | 430   | 440 | 450      | M14 | 317 | 560 | 714 | 780 | DN65  |
| GAS P 650/M CE - DN80 - FS80   | 490                   | 481 | 1118 | 420 | 160 | 705 | 440 | 490 | 552      | 552 | 580      | 430   | 440 | 450      | M14 | 317 | 560 | 727 | 800 | DN80  |
| GAS P 650/M CE - DN100 - FS100 | 490                   | 481 | 1118 | 420 | 160 | 705 | 440 | 490 | 552      | 552 | 580      | 430   | 440 | 450      | M14 | 317 | 590 | 765 | 840 | DN100 |



**ГОРЕЛКИ ДЛЯ ГАЗА/ДИЗЕЛЬНОГО  
ТОПЛИВА ДЛЯ ГАЗА/ТЯЖЕЛОГО  
ТОПЛИВА KN  
DUAL FUEL BURNERS  
GAS/LIGHT OIL  
GAS/HEAVY OIL KN**



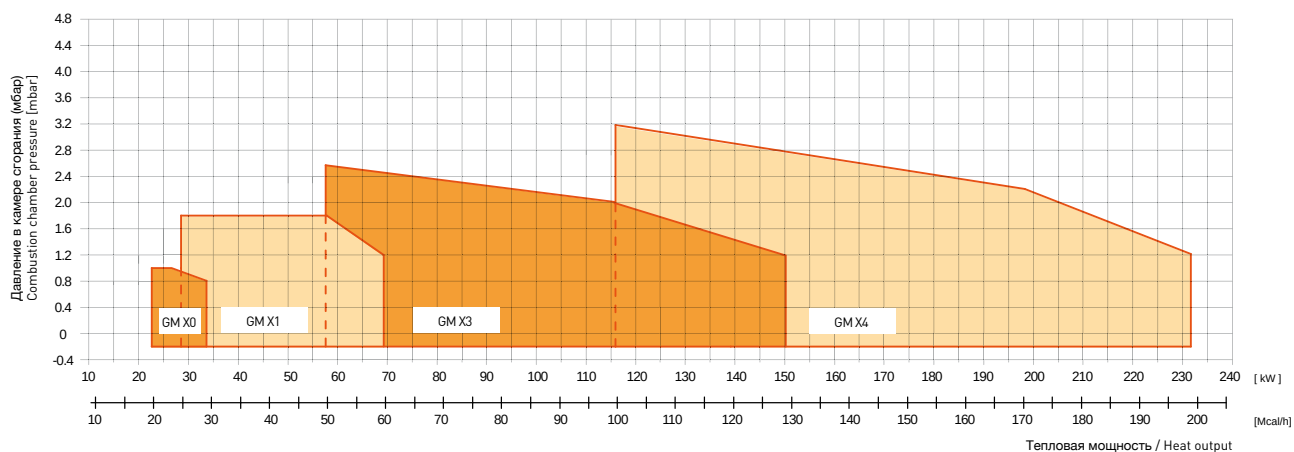
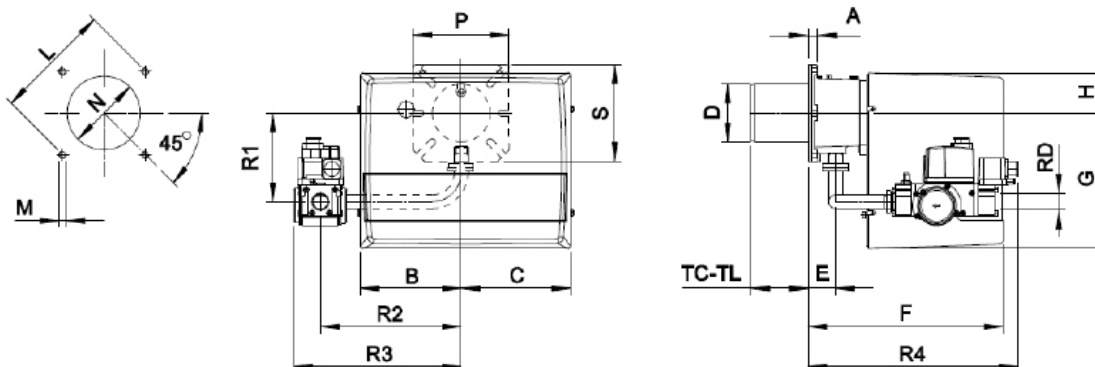
**4**

газ/дизельное топливо - Gas/Light Oil



| ОДНОСТУПЕНЧАТЫЕ<br>1 STAGE | kcal/h  |         | kW   |      | 1F |
|----------------------------|---------|---------|------|------|----|
|                            | min     | max     | min  | max  |    |
| GM X 0                     | 19.500  | 29.500  | 22,6 | 34,2 | 1F |
| GM X 1                     | 25.000  | 60.000  | 29   | 70   |    |
| GM X 3                     | 50.000  | 130.000 | 58   | 151  |    |
| GM X 4                     | 100.000 | 200.000 | 116  | 232  |    |

ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)

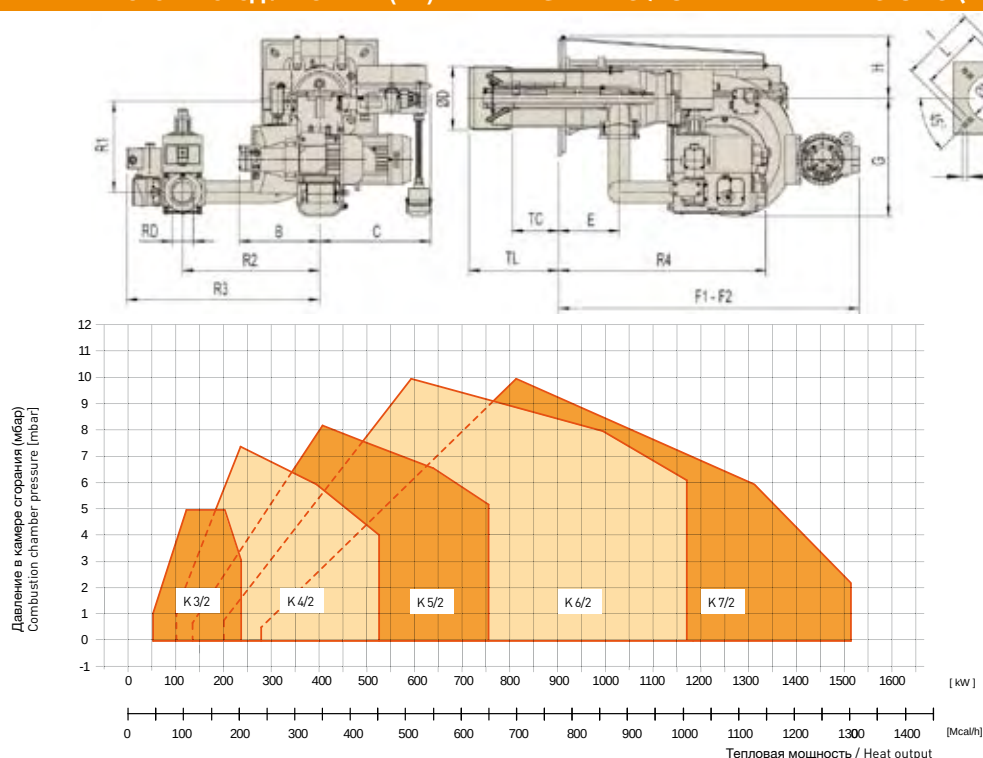


| МОДЕЛЬ<br>MODEL    |    |     |     |     |    |     |     |    |          |     |          |     |          |     |          |     |     |     |     |     | *СОВЕТОВАН/Suggested |     |     |      |  |
|--------------------|----|-----|-----|-----|----|-----|-----|----|----------|-----|----------|-----|----------|-----|----------|-----|-----|-----|-----|-----|----------------------|-----|-----|------|--|
|                    | A  | B   | C   | D   | E  | F   | G   | H  | L<br>min | L*  | L<br>max | M   | N<br>min | N*  | N<br>max | P   | S   | TC  | TL  | R1  | R2                   | R3  | R4  | RD   |  |
| GM X 0 - D1/2" - S | 15 | 162 | 175 | 90  | 43 | 305 | 210 | 65 | 130      | 150 | 170      | M8  | 100      | 110 | 130      | 150 | 150 | 90  | 150 | 132 | 200                  | 254 | 240 | 1/2" |  |
| GM X 1 - D1/2"- S  | 15 | 162 | 175 | 90  | 43 | 305 | 210 | 65 | 130      | 150 | 170      | M8  | 100      | 110 | 130      | 150 | 150 | 90  | 150 | 132 | 200                  | 254 | 240 | 1/2" |  |
| GM X 1 - D3/4" - S | 15 | 162 | 175 | 90  | 43 | 305 | 210 | 65 | 130      | 150 | 170      | M8  | 100      | 110 | 130      | 150 | 150 | 90  | 150 | 138 | 220                  | 262 | 328 | 3/4" |  |
| GM X 3 - D1" - S   | 16 | 185 | 195 | 108 | 54 | 340 | 248 | 70 | 150      | 170 | 170      | M8  | 120      | 130 | 140      | 190 | 150 | 130 | 250 | 168 | 280                  | 337 | 361 | 1"   |  |
| GM X 4 - D1" - S   | 20 | 185 | 195 | 125 | 78 | 368 | 248 | 70 | 170      | 205 | 226      | M10 | 130      | 140 | 160      | 200 | 200 | 160 | 280 | 173 | 280                  | 337 | 385 | 1"   |  |



| ДВУХСТУПЕНЧАТЫЕ<br>2 STAGES | ПРОГРЕССИВНЫЕ И<br>МОДУЛИРУЮЩИЕ<br>PROGRESSIVE &<br>MODULATING | kcal/h  |           | kW  |      |    |
|-----------------------------|----------------------------------------------------------------|---------|-----------|-----|------|----|
|                             |                                                                | min     | max       | min | max  |    |
| К 3/2                       | -                                                              | 100.000 | 200.000   | 116 | 232  | 1F |
| К 4/2                       | -                                                              | 200.000 | 450.000   | 232 | 523  | 3F |
| К 5/2                       | -                                                              | 350.000 | 650.000   | 407 | 754  |    |
| К 6/2                       | К 6/М                                                          | 500.000 | 1.000.000 | 581 | 1163 |    |
| К 7/2                       | К 7/М                                                          | 700.000 | 1.300.000 | 812 | 1508 |    |

### ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL        | B   | C   | D   | E   | F1   | F2   | G   | H   | I   | L   | M   | N   | TC  | TL  | R1  | R2  | R3  | R4  | RD     |
|------------------------|-----|-----|-----|-----|------|------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|--------|
| К 3/2 - D1" - FS32     | 188 | 360 | 135 | 98  | 493  | -    | 327 | 110 | 226 | 205 | M10 | 145 | 250 | 350 | 171 | 280 | 411 | 354 | 1"     |
| К 4/2 - D1" 1/2 - FS40 | 188 | 360 | 150 | 98  | 493  | -    | 327 | 110 | 226 | 205 | M10 | 160 | 250 | 350 | 203 | 280 | 432 | 456 | 1" 1/2 |
| К 5/2 - D1" 1/2 - FS40 | 236 | 365 | 165 | 168 | 840  | 1280 | 327 | 171 | 368 | 340 | M12 | 180 | 250 | 315 | 260 | 380 | 536 | 576 | 1" 1/2 |
| К 5/2 - D2" - FS50     | 236 | 365 | 165 | 168 | 840  | 1280 | 327 | 171 | 368 | 340 | M12 | 180 | 250 | 315 | 260 | 380 | 536 | 576 | 2"     |
| К 6/2 - D2" - FS50     | 238 | 393 | 210 | 193 | 980  | 1560 | 438 | 213 | 368 | 340 | M14 | 220 | 280 | 400 | 283 | 380 | 552 | 615 | 2"     |
| К 6/2 - DN65 - FS65    | 238 | 393 | 210 | 193 | 980  | 1560 | 438 | 213 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 340 | 495 | 585 | DN65   |
| К 6/2 - DN80 - FS80    | 238 | 393 | 210 | 193 | 980  | 1560 | 438 | 213 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 420 | 590 | 605 | DN80   |
| К 7/2 - D2" - FS50     | 238 | 393 | 210 | 193 | 980  | 1560 | 438 | 213 | 368 | 340 | M14 | 220 | 280 | 400 | 283 | 380 | 552 | 615 | 2"     |
| К 7/2 - DN65 - FS65    | 238 | 393 | 210 | 193 | 980  | 1560 | 438 | 213 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 340 | 495 | 585 | DN65   |
| К 7/2 - DN80 - FS80    | 238 | 393 | 210 | 193 | 980  | 1560 | 438 | 213 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 420 | 590 | 605 | DN80   |
| К 6/М - D2"            | 380 | 393 | 209 | 193 | 1037 | 1617 | 438 | 267 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 510 | 673 | 552 | 2"     |
| К 6/М - DN65           | 380 | 393 | 209 | 193 | 1037 | 1617 | 438 | 267 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 510 | 665 | 586 | DN65   |
| К 6/М - DN80           | 380 | 393 | 209 | 193 | 1037 | 1617 | 438 | 267 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 550 | 720 | 626 | DN80   |
| К 7/М - D2"            | 380 | 393 | 209 | 193 | 1037 | 1617 | 438 | 267 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 510 | 673 | 552 | 2"     |
| К 7/М - DN65           | 380 | 393 | 209 | 193 | 1037 | 1617 | 438 | 267 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 510 | 665 | 586 | DN65   |
| К 7/М - DN80           | 380 | 393 | 209 | 193 | 1037 | 1617 | 438 | 267 | 368 | 340 | M14 | 220 | 280 | 400 | 228 | 550 | 720 | 626 | DN80   |

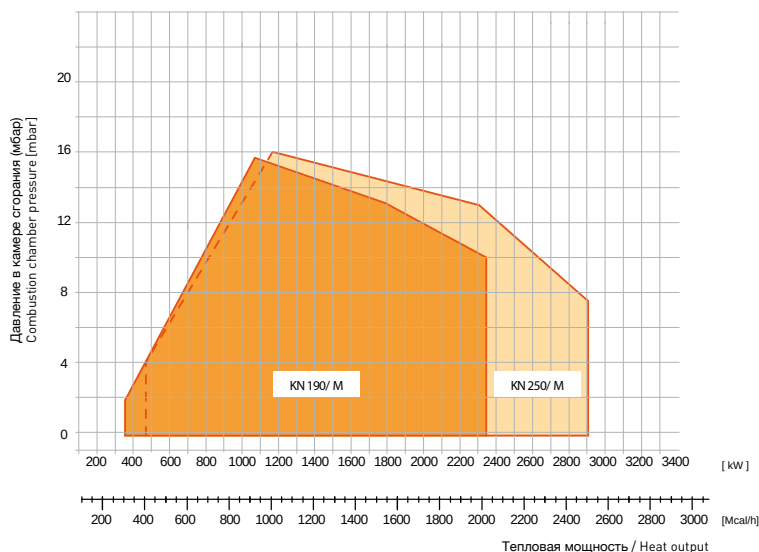
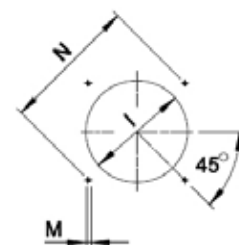
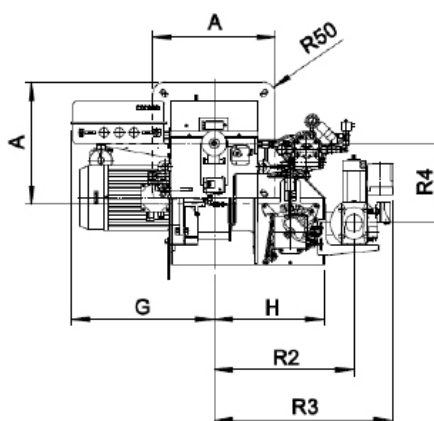
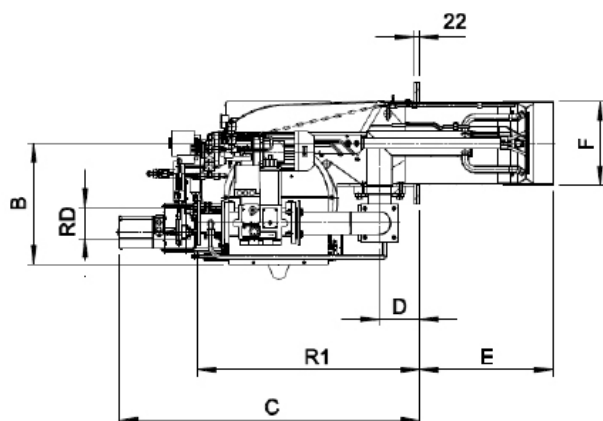
газ/дизельное топливо - Gas/Light Oil



| ПРОГРЕССИВНЫЕ И МОДУЛИРУЮЩИЕ<br>PROGRESSIVE & MODULATING | kcal/h    |           | kW   |      | 3F |
|----------------------------------------------------------|-----------|-----------|------|------|----|
|                                                          | min       | max       | min  | max  |    |
| K 190/M*                                                 | 900.000   | 2.019.000 | 1044 | 2390 | 3F |
| K 250/M*                                                 | 1.000.000 | 2.500.000 | 1160 | 2900 |    |

\* Имеются также в версии Low Nox  
\* Available also in Low NOx version

ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL         | *советовал/Suggested |     |      |     |     |     |     |     |       |     |       |     |       |     |       |     |     |
|-------------------------|----------------------|-----|------|-----|-----|-----|-----|-----|-------|-----|-------|-----|-------|-----|-------|-----|-----|
|                         | A                    | B   | C    | D   | E   | F   | G   | H   | I min | I*  | I max | M   | N min | N*  | N max | R1  | R2  |
| K 190/M - D2" - FS50    | 360                  | 453 | 1100 | 145 | 481 | 265 | 463 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 254 | 509 |
| K 190/M - DN65 - FS65   | 360                  | 453 | 1100 | 145 | 481 | 265 | 463 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 254 | 480 |
| K 190/M - DN80 - FS80   | 360                  | 453 | 1100 | 145 | 481 | 265 | 463 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 254 | 480 |
| K 190/M - DN100 - FS100 | 360                  | 453 | 1100 | 145 | 481 | 265 | 463 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 254 | 480 |
| K 250/M - D2" - FS50    | 360                  | 453 | 1100 | 145 | 481 | 265 | 463 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 254 | 509 |
| K 250/M - DN65 - FS65   | 360                  | 453 | 1100 | 145 | 481 | 265 | 463 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 254 | 480 |
| K 250/M - DN80 - FS80   | 360                  | 453 | 1100 | 145 | 481 | 265 | 463 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 254 | 480 |
| K 250/M - DN100 - FS100 | 360                  | 453 | 1100 | 145 | 481 | 265 | 463 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 254 | 480 |



## газ/дизельное топливо - Gas/Light Oil

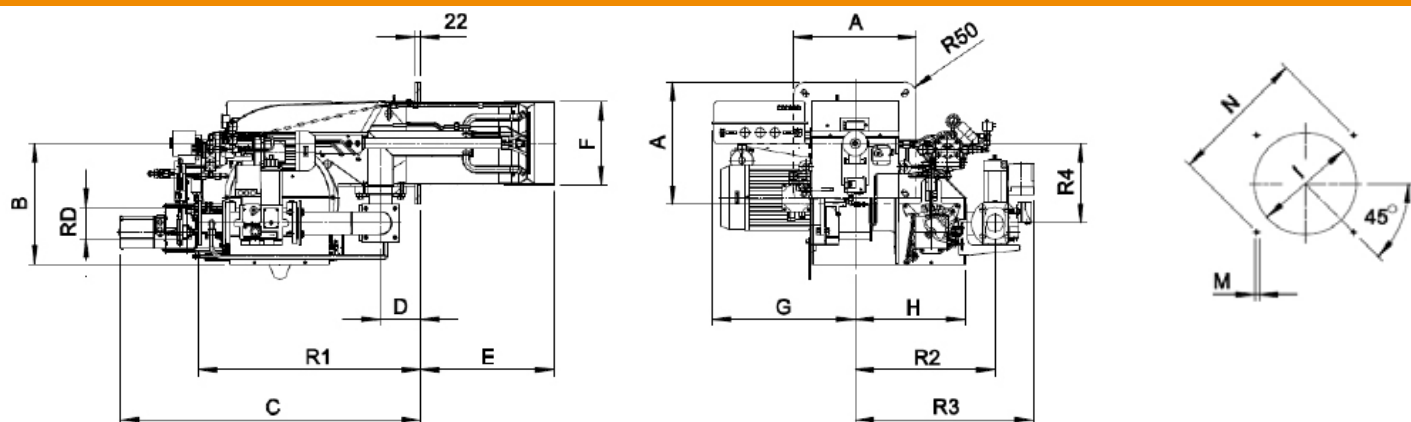


| ПРОГРЕССИВНЫЕ И МОДУЛИРУЮЩИЕ<br>PROGRESSIVE & MODULATING | kcal/h    |            | kW   |       | 3F |
|----------------------------------------------------------|-----------|------------|------|-------|----|
|                                                          | min       | max        | min  | max   |    |
| K 350/M *                                                | 1.200.000 | 3.500.000  | 1390 | 4060  |    |
| K 450/M *                                                | 1.600.000 | 4.500.000  | 1850 | 5220  |    |
| K 550/M *                                                | 2.000.000 | 5.500.000  | 2325 | 6395  |    |
| K 650/M *                                                | 3.000.000 | 6.500.000  | 3488 | 7558  |    |
| K 750/M *                                                | 3.500.000 | 7.500.000  | 4070 | 8721  |    |
| K 1000/M *                                               | 3.440.000 | 10.000.000 | 4000 | 11628 |    |

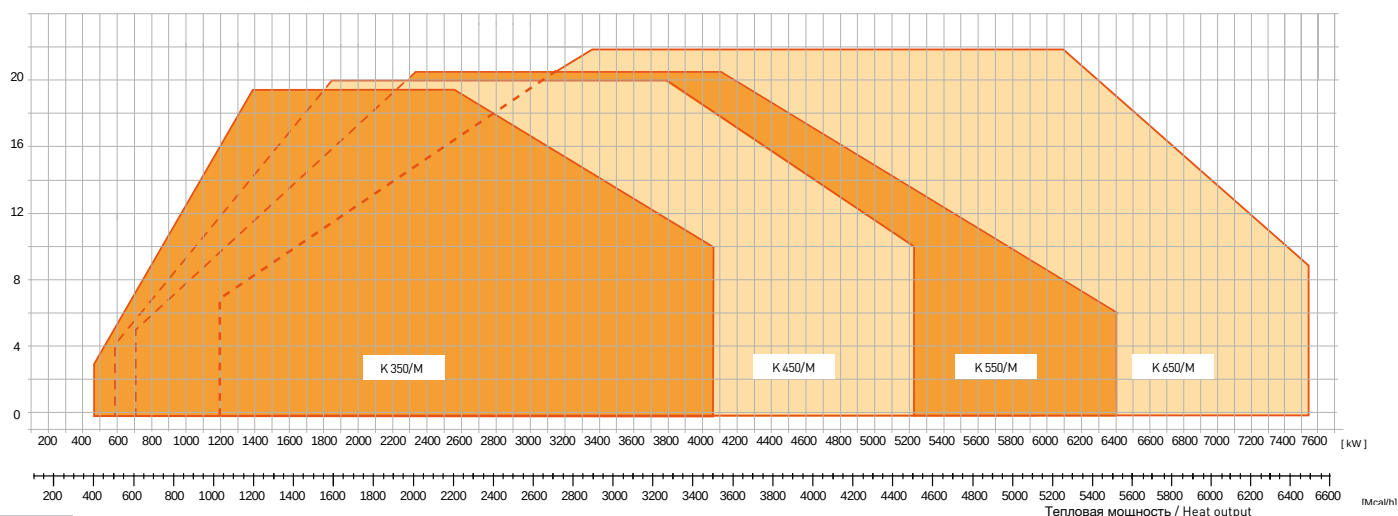
\* Поставляются также версии с ИНВЕРТОРОМ и ЭЛЕКТРОННЫМ КУЛАЧКОМ

\* Available also versions with INVERTER and ELECTRONIC BURNER CONTROL

## ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



Давление в камере сгорания (мбар)  
Combustion chamber pressure [mbar]



МОДЕЛЬ  
MODEL

\* советова/ Suggested

| МОДЕЛЬ<br>MODEL         | A   | B   | C    | D   | E   | F   | G   | H   | I min | I*  | I max | M   | min | N*  | max | R1  | R2  | R3  | R4  | RD    |
|-------------------------|-----|-----|------|-----|-----|-----|-----|-----|-------|-----|-------|-----|-----|-----|-----|-----|-----|-----|-----|-------|
| K 350/M - D2"           | 490 | 481 | 1206 | 160 | 535 | 334 | 570 | 440 | 350   | 350 | 450   | M14 | 552 | 552 | 580 | 646 | 535 | 664 | 317 | D2"   |
| K 350/M - DN65 - FS65   | 490 | 481 | 1206 | 160 | 535 | 334 | 570 | 440 | 350   | 350 | 450   | M14 | 552 | 552 | 580 | 780 | 560 | 715 | 317 | DN65  |
| K 350/M - DN80 - FS80   | 490 | 481 | 1206 | 160 | 535 | 334 | 570 | 440 | 350   | 350 | 450   | M14 | 552 | 552 | 580 | 800 | 560 | 730 | 317 | DN80  |
| K 350/M - DN100 - FS100 | 490 | 481 | 1206 | 160 | 535 | 334 | 570 | 440 | 350   | 350 | 450   | M14 | 552 | 552 | 580 | 840 | 590 | 765 | 317 | D2"   |
| K 450/M - D2"           | 490 | 481 | 1206 | 160 | 560 | 380 | 570 | 440 | 390   | 390 | 450   | M14 | 552 | 552 | 580 | 646 | 535 | 664 | 317 | DN100 |
| K 450/M - DN65 - FS65   | 490 | 481 | 1206 | 160 | 560 | 380 | 570 | 440 | 390   | 390 | 450   | M14 | 552 | 552 | 580 | 780 | 560 | 715 | 317 | DN65  |
| K 450/M - DN80 - FS80   | 490 | 481 | 1206 | 160 | 560 | 380 | 570 | 440 | 390   | 390 | 450   | M14 | 552 | 552 | 580 | 800 | 560 | 730 | 317 | DN80  |
| K 450/M - DN100 - FS100 | 490 | 481 | 1206 | 160 | 560 | 380 | 570 | 440 | 390   | 390 | 450   | M14 | 552 | 552 | 580 | 840 | 590 | 765 | 317 | DN100 |
| K 550/M - D2"           | 490 | 481 | 1206 | 160 | 560 | 380 | 661 | 440 | 390   | 390 | 450   | M14 | 552 | 552 | 580 | 646 | 535 | 664 | 317 | D2"   |
| K 550/M - DN65 - FS65   | 490 | 481 | 1206 | 160 | 560 | 380 | 661 | 440 | 390   | 390 | 450   | M14 | 552 | 552 | 580 | 780 | 560 | 715 | 317 | DN65  |
| K 550/M - DN80 - FS80   | 490 | 481 | 1206 | 160 | 560 | 380 | 661 | 440 | 390   | 390 | 450   | M14 | 552 | 552 | 580 | 800 | 560 | 730 | 317 | DN80  |
| K 550/M - DN100 - FS100 | 490 | 481 | 1206 | 160 | 560 | 380 | 661 | 440 | 390   | 390 | 450   | M14 | 552 | 552 | 580 | 840 | 590 | 765 | 317 | DN100 |
| K 650/M - DN65 - FS65   | 490 | 481 | 1206 | 160 | 560 | 430 | 705 | 440 | 440   | 440 | 450   | M14 | 552 | 552 | 580 | 780 | 560 | 715 | 317 | DN65  |
| K 650/M - DN80 - FS80   | 490 | 481 | 1206 | 160 | 560 | 430 | 705 | 440 | 440   | 440 | 450   | M14 | 552 | 552 | 580 | 800 | 560 | 730 | 317 | DN80  |
| K 650/M - DN100 - FS100 | 490 | 481 | 1206 | 160 | 560 | 430 | 705 | 440 | 440   | 440 | 450   | M14 | 552 | 552 | 580 | 840 | 590 | 765 | 317 | DN100 |

## газ/тяжелое топливо - Gas/Heavy Oil

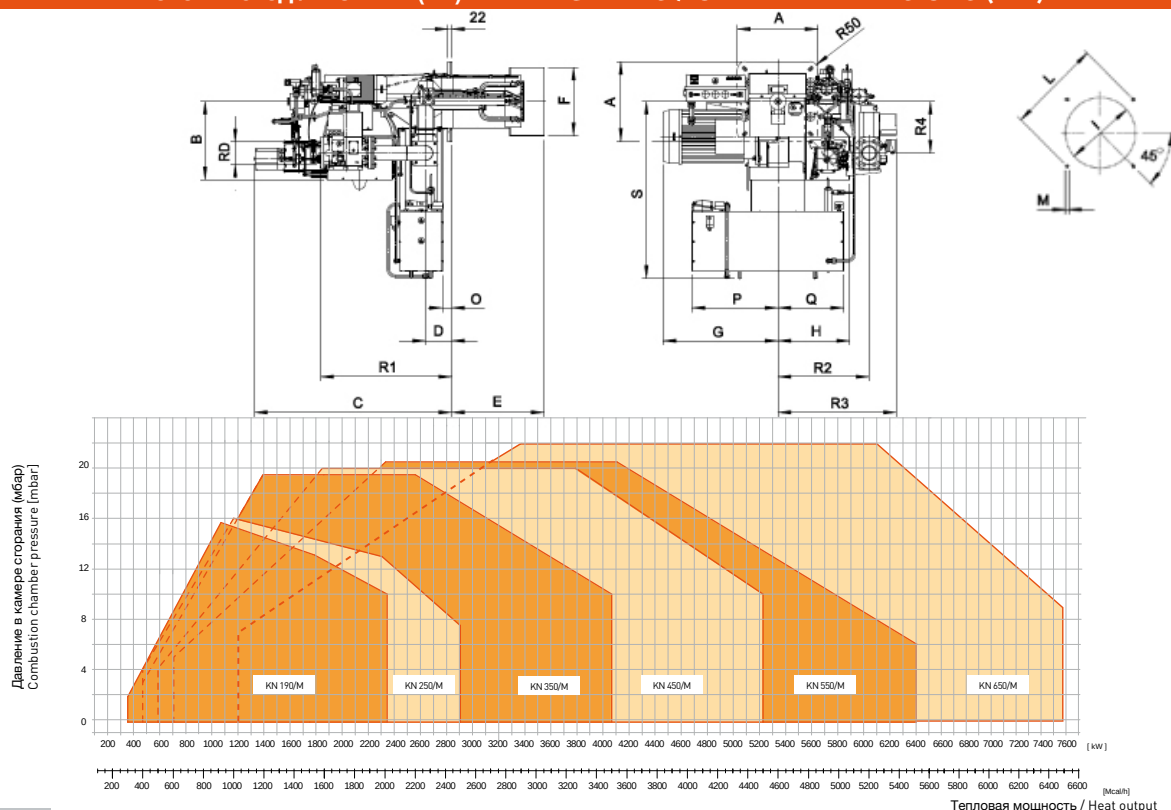


| ПРОГРЕССИВНЫЕ И МОДУЛИРУЮЩИЕ<br>PROGRESSIVE & MODULATING | kcal/h    |            | kW   |       | 3F |
|----------------------------------------------------------|-----------|------------|------|-------|----|
|                                                          | min       | max        | min  | max   |    |
| KN 190/M*                                                | 900.000   | 2.019.000  | 1044 | 2341  | 3F |
| KN 250/M*                                                | 1.000.000 | 2.500.000  | 1160 | 2900  |    |
| KN 350/M*                                                | 1.200.000 | 3.500.000  | 1390 | 4060  |    |
| KN 450/M*                                                | 1.600.000 | 4.500.000  | 1850 | 5220  |    |
| KN 550/M*                                                | 2.000.000 | 5.500.000  | 2325 | 6380  |    |
| KN 650/M*                                                | 3.000.000 | 6.500.000  | 3488 | 7558  |    |
| KN 750/M*                                                | 3.500.000 | 7.500.000  | 4070 | 8721  |    |
| KN 1000/M*                                               | 3.440.000 | 10.000.000 | 4000 | 11628 |    |

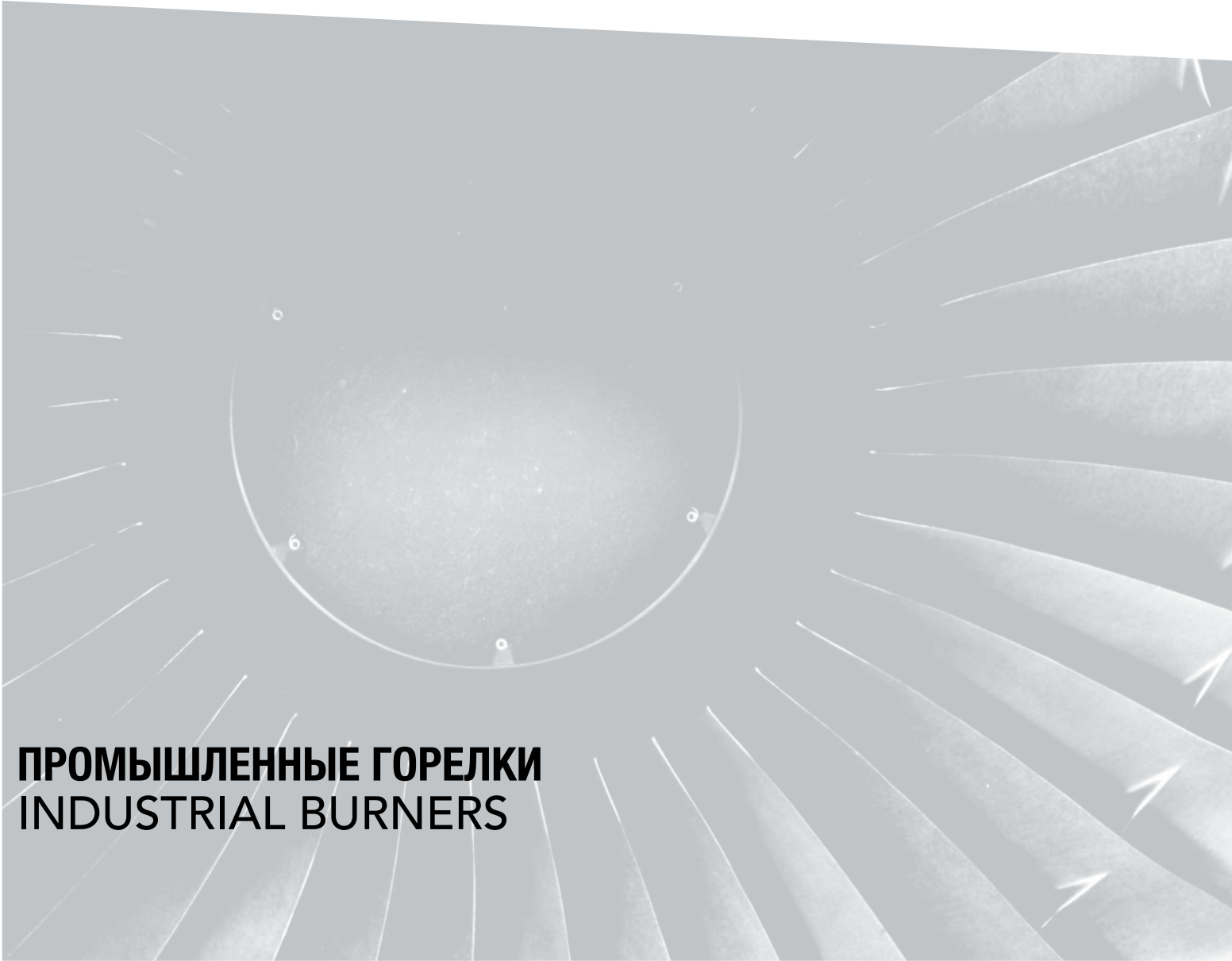
\* Поставляются также версии с ИНВЕРТОРОМ и ЭЛЕКТРОННЫМ КУЛАЧКОМ

\* Available also versions with INVERTER and ELECTRONIC BURNER CONTROL

## ТЕПЛОВОЙ РАСХОД / РАЗМЕРЫ (мм) - FIRING RATES / OVERALL DIMENSIONS (mm)



| МОДЕЛЬ<br>MODEL          | * советова/ Suggested |     |      |     |     |     |     |     |       |     |       |     |       |     |       |    |     |     |      |     |
|--------------------------|-----------------------|-----|------|-----|-----|-----|-----|-----|-------|-----|-------|-----|-------|-----|-------|----|-----|-----|------|-----|
|                          | A                     | B   | C    | D   | E   | F   | G   | H   | I min | I*  | I max | M   | N min | N*  | N max | O  | P   | Q   | S    | R1  |
| KN 190/M - D2" - FS50    | 360                   | 453 | 1100 | 145 | 480 | 265 | 520 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 93 | 403 | 403 | 790  | 504 |
| KN 190/M - DN65 - FS65   | 360                   | 453 | 1100 | 145 | 480 | 265 | 520 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 93 | 403 | 403 | 790  | 688 |
| KN 190/M - DN80 - FS80   | 360                   | 453 | 1100 | 145 | 480 | 265 | 520 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 93 | 403 | 403 | 790  | 708 |
| KN 190/M - DN100 - FS100 | 360                   | 453 | 1100 | 145 | 480 | 265 | 520 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 93 | 403 | 403 | 790  | 748 |
| KN 250/M - D2" - FS50    | 360                   | 453 | 1100 | 145 | 480 | 265 | 520 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 93 | 403 | 403 | 790  | 504 |
| KN 250/M - DN65 - FS65   | 360                   | 453 | 1100 | 145 | 480 | 265 | 520 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 93 | 403 | 403 | 790  | 688 |
| KN 250/M - DN80 - FS80   | 360                   | 453 | 1100 | 145 | 480 | 265 | 520 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 93 | 403 | 403 | 790  | 708 |
| KN 250/M - DN100 - FS100 | 360                   | 453 | 1100 | 145 | 480 | 265 | 520 | 363 | 280   | 280 | 320   | M14 | 396   | 424 | 438   | 93 | 403 | 403 | 790  | 748 |
| KN 350/M - DN65 - FS65   | 490                   | 481 | 1206 | 160 | 535 | 334 | 575 | 440 | 350   | 350 | 450   | M14 | 552   | 552 | 580   | 57 | 523 | 405 | 933  | 780 |
| KN 350/M - DN80 - FS80   | 490                   | 481 | 1206 | 160 | 535 | 334 | 575 | 440 | 350   | 350 | 450   | M14 | 552   | 552 | 580   | 57 | 523 | 405 | 933  | 800 |
| KN 350/M - DN100 - FS100 | 490                   | 481 | 1206 | 160 | 535 | 334 | 575 | 440 | 350   | 350 | 450   | M14 | 552   | 552 | 580   | 57 | 523 | 405 | 933  | 840 |
| KN 450/M - DN65 - FS65   | 490                   | 481 | 1206 | 160 | 560 | 380 | 575 | 440 | 390   | 390 | 450   | M14 | 552   | 552 | 580   | 57 | 523 | 405 | 1085 | 780 |
| KN 450/M - DN80 - FS80   | 490                   | 481 | 1206 | 160 | 560 | 380 | 575 | 440 | 390   | 390 | 450   | M14 | 552   | 552 | 580   | 57 | 523 | 405 | 1085 | 800 |
| KN 450/M - DN100 - FS100 | 490                   | 481 | 1206 | 160 | 560 | 380 | 575 | 440 | 390   | 390 | 450   | M14 | 552   | 552 | 580   | 57 | 523 | 405 | 1085 | 840 |
| KN 550/M - DN65 - FS65   | 490                   | 481 | 1206 | 160 | 560 | 380 | 661 | 440 | 390   | 410 | 450   | M14 | 552   | 552 | 580   | 57 | 523 | 405 | 1085 | 780 |
| KN 550/M - DN80 - FS80   | 490                   | 481 | 1206 | 160 | 560 | 380 | 661 | 440 | 390   | 410 | 450   | M14 | 552   | 552 | 580   | 57 | 523 | 405 | 1085 | 800 |
| KN 550/M - DN100 - FS100 | 490                   | 481 | 1206 | 160 | 560 | 380 | 661 | 440 | 390   | 410 | 450   | M14 | 552   | 552 | 580   | 57 | 523 | 405 | 1085 | 840 |
| KN 650/M - DN65 - FS65   | 490                   | 481 | 1206 | 160 | 560 | 430 | 705 | 440 | 440   | 440 | 450   | M14 | 552   | 552 | 580   | 57 | 523 | 405 | 1085 | 780 |
| KN 650/M - DN80 - FS80   | 490                   | 481 | 1206 | 160 | 560 | 430 | 705 | 440 | 440   | 440 | 450   | M14 | 552   | 552 | 580   | 57 | 523 | 405 | 1085 | 800 |
| KN 650/M - DN100 - FS100 | 490                   | 481 | 1206 | 160 | 560 | 430 | 705 | 440 | 440   | 440 | 450   | M14 | 552   | 552 | 580   | 57 | 523 | 405 | 1085 | 840 |

A close-up, grayscale photograph of industrial burner components. The image shows a central circular area with several small, light-colored circular features, possibly nozzles or ports. This central area is surrounded by a series of curved, rib-like structures that radiate outwards, creating a sense of depth and mechanical complexity. The lighting is dramatic, with strong highlights and shadows that emphasize the metallic textures and geometric forms.

# **ПРОМЫШЛЕННЫЕ ГОРЕЛКИ** **INDUSTRIAL BURNERS**



| ГОРЕЛКИ ДЛЯ ГАЗА<br>GAS BURNERS | kcal/h    |           | kW   |      |    |
|---------------------------------|-----------|-----------|------|------|----|
|                                 | min       | max       | min  | max  |    |
| HI-GAS P190/M CE TL             | 900.000   | 1.900.000 | 1044 | 2204 | 3F |
| HI-GAS P250/M CE TL             | 1.000.000 | 2.500.000 | 1160 | 2900 |    |
| HI-GAS P350/M CE TL             | 1.200.000 | 3.500.000 | 1390 | 4060 |    |
| HI-GAS P450/M CE TL             | 1.600.000 | 4.500.000 | 1850 | 5220 |    |
| HI-GAS P550/M CE TL             | 2.000.000 | 5.500.000 | 2325 | 6380 |    |
| HI-GAS P650/M CE TL             | 3.000.000 | 6.500.000 | 3488 | 7558 |    |



## ГОРЕЛКИ ДЛЯ ДИЗЕЛЬНОГО ТОПЛИВА / LIGHT OIL BURNERS

| ГОРЕЛКИ ДЛЯ ДИЗЕЛЬНОГО ТОПЛИВА<br>LIGHT OIL BURNERS | kg/h |     | kW   |      |    |
|-----------------------------------------------------|------|-----|------|------|----|
|                                                     | min  | max | min  | max  |    |
| HI-FGP 190/M CE TL                                  | 60   | 206 | 700  | 2390 | 3F |
| HI-FGP 250/M CE TL                                  | 80   | 250 | 930  | 2900 |    |
| HI-FGP 350/M CE TL                                  | 120  | 350 | 1392 | 4060 |    |
| HI-FGP 450/M CE TL                                  | 160  | 450 | 1856 | 5220 |    |
| HI-FGP 550/M CE TL                                  | 200  | 550 | 2320 | 6380 |    |
| HI-FGP 650/M CE TL                                  | 300  | 650 | 3488 | 7558 |    |

## ГОРЕЛКИ ДЛЯ ТЯЖЕЛОГО ТОПЛИВА / HEAVY OIL BURNERS

| ГОРЕЛКИ ДЛЯ ТЯЖЕЛОГО ТОПЛИВА<br>HEAVY OIL BURNERS | kg/h |     | kW   |      |    |
|---------------------------------------------------|------|-----|------|------|----|
|                                                   | min  | max | min  | max  |    |
| HI-FNDP 190/M CE TL                               | 80   | 206 | 928  | 2341 | 3F |
| HI-FNDP 250/M CE TL                               | 100  | 250 | 1160 | 2842 |    |
| HI-FNDP 350/M CE TL                               | 120  | 350 | 1364 | 3979 |    |
| HI-FNDP 450/M CE TL                               | 160  | 450 | 1819 | 5116 |    |
| HI-FNDP 550/M CE TL                               | 200  | 550 | 2274 | 6252 |    |
| HI-FNDP 650/M CE TL                               | 300  | 650 | 3488 | 7558 |    |



## ГОРЕЛКИ ДЛЯ ГАЗА/ДИЗЕЛЬНОГО ТОПЛИВА / DUAL FUEL BURNERS GAS/LIGHT OIL

| ГОРЕЛКИ ДЛЯ ГАЗА/ДИЗЕЛЬНОГО ТОПЛИВА<br>DUAL FUEL BURNERS GAS/LIGHT OIL | kcal/h    |           | kW   |      |    |
|------------------------------------------------------------------------|-----------|-----------|------|------|----|
|                                                                        | min       | max       | min  | max  |    |
| HI-K 190/M TL                                                          | 900.000   | 2.019.000 | 1044 | 2341 | 3F |
| HI-K 250/M TL                                                          | 900.000   | 2.400.000 | 1044 | 2790 |    |
| HI-K 350/M TL                                                          | 1.200.000 | 3.500.000 | 1392 | 4060 |    |
| HI-K 450/M TL                                                          | 1.600.000 | 4.500.000 | 1856 | 5220 |    |
| HI-K 550/M TL                                                          | 2.000.000 | 5.500.000 | 2320 | 6380 |    |
| HI-K 650/M TL                                                          | 3.000.000 | 6.500.000 | 3488 | 7558 |    |

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The illustrations and data here shown are indicative. Being constantly involved in the continuous improvement of the whole production range, F.B.R. Bruciatori S.r.l. reserves the right to bring, without any obligation of warning, any changes that would be appropriate to the continuing development of their products.



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