



	Yield $\pm$ stat. $\pm$ syst.			Fraction $\pm$ stat. $\pm$ syst. [%]		
	$\gamma\gamma$	$\gamma$ -jet	jet-jet	$\gamma\gamma$	$\gamma$ -jet	jet-jet
$m_{\gamma\gamma}[GeV]$						
105 - 106	5823 $\pm$ 171 $^{+360}_{-133}$	3560 $\pm$ 173 $^{+105}_{-328}$	531 $\pm$ 53 $^{+30}_{-41}$	58.7 $\pm$ 1.8 $^{+3.6}_{-1.4}$	35.9 $\pm$ 1.8 $^{+1.1}_{-3.3}$	5.4 $\pm$ 0.6 $^{+0.3}_{-0.4}$
LP2	+0 -133	+105 -0	+29 -0	+0.00 -1.35	+1.06 -0.00	+0.29 -0.00
LP4	+171 -0	+0 -178	+5 -0	+1.74 -0.00	+0.00 -1.79	+0.05 -0.00
LP5	+317 -0	+0 -276	+0 -41	+3.19 -0.00	+0.00 -2.78	+0.00 -0.41
106 - 107	5570 $\pm$ 163 $^{+228}_{-148}$	3185 $\pm$ 165 $^{+133}_{-108}$	623 $\pm$ 55 $^{+15}_{-121}$	59.4 $\pm$ 1.8 $^{+2.4}_{-1.6}$	34.0 $\pm$ 1.8 $^{+1.4}_{-1.2}$	6.6 $\pm$ 0.7 $^{+0.2}_{-1.3}$
LP2	+0 -148	+133 -0	+15 -0	+0.00 -1.58	+1.42 -0.00	+0.16 -0.00
LP4	+109 -0	+0 -37	+0 -71	+1.16 -0.00	+0.00 -0.40	+0.00 -0.76
LP5	+200 -0	+0 -101	+0 -98	+2.13 -0.00	+0.00 -1.08	+0.00 -1.05
107 - 108	5466 $\pm$ 165 $^{+290}_{-81}$	3259 $\pm$ 166 $^{+33}_{-242}$	528 $\pm$ 52 $^{+50}_{-56}$	59.1 $\pm$ 1.8 $^{+3.2}_{-0.9}$	35.2 $\pm$ 1.8 $^{+0.4}_{-2.6}$	5.7 $\pm$ 0.7 $^{+0.5}_{-0.6}$
LP2	+0 -81	+33 -0	+50 -0	+0.00 -0.89	+0.35 -0.00	+0.54 -0.00
LP4	+137 -0	+0 -104	+0 -36	+1.50 -0.00	+0.00 -1.12	+0.00 -0.39
LP5	+255 -0	+0 -219	+0 -43	+2.80 -0.00	+0.00 -2.34	+0.00 -0.46
108 - 109	5412 $\pm$ 155 $^{+311}_{-126}$	2966 $\pm$ 154 $^{+90}_{-241}$	477 $\pm$ 48 $^{+34}_{-79}$	61.1 $\pm$ 1.8 $^{+3.6}_{-1.4}$	33.5 $\pm$ 1.8 $^{+1.0}_{-2.7}$	5.4 $\pm$ 0.6 $^{+0.4}_{-0.9}$
LP2	+0 -126	+90 -0	+34 -0	+0.00 -1.41	+1.03 -0.00	+0.38 -0.00
LP4	+145 -0	+0 -108	+0 -41	+1.67 -0.00	+0.00 -1.20	+0.00 -0.47
LP5	+275 -0	+0 -215	+0 -67	+3.16 -0.00	+0.00 -2.40	+0.00 -0.76
109 - 110	5330 $\pm$ 152 $^{+194}_{-104}$	2749 $\pm$ 152 $^{+64}_{-143}$	471 $\pm$ 48 $^{+41}_{-56}$	62.3 $\pm$ 1.8 $^{+2.3}_{-1.2}$	32.2 $\pm$ 1.8 $^{+0.7}_{-1.7}$	5.5 $\pm$ 0.7 $^{+0.5}_{-0.7}$
LP2	+0 -104	+64 -0	+41 -0	+0.00 -1.22	+0.74 -0.00	+0.48 -0.00
LP4	+66 -0	+0 -33	+0 -34	+0.79 -0.00	+0.00 -0.39	+0.00 -0.40
LP5	+182 -0	+0 -139	+0 -44	+2.13 -0.00	+0.00 -1.62	+0.00 -0.52
110 - 111	5185 $\pm$ 147 $^{+233}_{-97}$	2507 $\pm$ 149 $^{+56}_{-172}$	535 $\pm$ 50 $^{+40}_{-67}$	63.0 $\pm$ 1.9 $^{+2.9}_{-1.2}$	30.5 $\pm$ 1.8 $^{+0.7}_{-2.1}$	6.5 $\pm$ 0.7 $^{+0.5}_{-0.8}$
LP2	+0 -97	+56 -0	+40 -0	+0.00 -1.17	+0.68 -0.00	+0.49 -0.00
LP4	+114 -0	+0 -92	+0 -26	+1.42 -0.00	+0.00 -1.11	+0.00 -0.31
LP5	+203 -0	+0 -145	+0 -62	+2.49 -0.00	+0.00 -1.75	+0.00 -0.75
111 - 112	5130 $\pm$ 145 $^{+159}_{-132}$	2434 $\pm$ 143 $^{+91}_{-53}$	440 $\pm$ 46 $^{+41}_{-105}$	64.1 $\pm$ 1.9 $^{+2.0}_{-1.6}$	30.4 $\pm$ 1.8 $^{+1.1}_{-0.7}$	5.5 $\pm$ 0.7 $^{+0.5}_{-1.3}$
LP2	+0 -132	+91 -0	+41 -0	+0.00 -1.65	+1.14 -0.00	+0.51 -0.00
LP4	+85 -0	+0 -33	+0 -53	+1.07 -0.00	+0.00 -0.41	+0.00 -0.66
LP5	+134 -0	+0 -42	+0 -91	+1.66 -0.00	+0.00 -0.53	+0.00 -1.13
112 - 113	4867 $\pm$ 140 $^{+201}_{-105}$	2514 $\pm$ 137 $^{+72}_{-188}$	396 $\pm$ 44 $^{+35}_{-20}$	62.6 $\pm$ 1.8 $^{+2.6}_{-1.4}$	32.3 $\pm$ 1.8 $^{+0.9}_{-2.4}$	5.1 $\pm$ 0.7 $^{+0.4}_{-0.3}$
LP2	+0 -105	+72 -0	+35 -0	+0.00 -1.37	+0.92 -0.00	+0.45 -0.00
LP4	+110 -0	+0 -109	+0 -0	+1.41 -0.00	+0.00 -1.41	+0.00 -0.01
LP5	+168 -0	+0 -153	+0 -20	+2.20 -0.00	+0.00 -1.95	+0.00 -0.25
113 - 114	4784 $\pm$ 140 $^{+220}_{-148}$	2230 $\pm$ 138 $^{+109}_{-163}$	422 $\pm$ 45 $^{+38}_{-56}$	64.3 $\pm$ 1.9 $^{+2.9}_{-2.0}$	30.0 $\pm$ 1.9 $^{+1.5}_{-2.2}$	5.7 $\pm$ 0.7 $^{+0.5}_{-0.8}$
LP2	+0 -148	+109 -0	+38 -0	+0.00 -1.98	+1.47 -0.00	+0.51 -0.00
LP4	+101 -0	+0 -71	+0 -28	+1.35 -0.00	+0.00 -0.96	+0.00 -0.38
LP5	+195 -0	+0 -146	+0 -48	+2.62 -0.00	+0.00 -1.97	+0.00 -0.65
114 - 115	4514 $\pm$ 133 $^{+203}_{-95}$	2250 $\pm$ 121 $^{+70}_{-182}$	369 $\pm$ 40 $^{+26}_{-24}$	63.3 $\pm$ 1.8 $^{+2.9}_{-1.3}$	31.5 $\pm$ 1.8 $^{+1.0}_{-2.5}$	5.2 $\pm$ 0.7 $^{+0.4}_{-0.3}$
LP2	+0 -95	+70 -0	+26 -0	+0.00 -1.34	+0.98 -0.00	+0.36 -0.00
LP4	+102 -0	+0 -97	+0 -5	+1.43 -0.00	+0.00 -1.36	+0.00 -0.07
LP5	+175 -0	+0 -153	+0 -23	+2.47 -0.00	+0.00 -2.14	+0.00 -0.33
115 - 116	4261 $\pm$ 131 $^{+196}_{-102}$	2092 $\pm$ 129 $^{+62}_{-138}$	378 $\pm$ 41 $^{+37}_{-59}$	63.3 $\pm$ 2.0 $^{+2.9}_{-1.5}$	31.1 $\pm$ 2.0 $^{+0.9}_{-2.0}$	5.6 $\pm$ 0.7 $^{+0.5}_{-0.9}$
LP2	+0 -102	+62 -0	+37 -0	+0.00 -1.49	+0.94 -0.00	+0.56 -0.00
LP4	+108 -0	+0 -77	+0 -33	+1.63 -0.00	+0.00 -1.14	+0.00 -0.49
LP5	+163 -0	+0 -114	+0 -49	+2.42 -0.00	+0.00 -1.69	+0.00 -0.73
116 - 117	4441 $\pm$ 129 $^{+180}_{-98}$	1965 $\pm$ 124 $^{+65}_{-127}$	341 $\pm$ 39 $^{+33}_{-58}$	65.8 $\pm$ 1.9 $^{+2.7}_{-1.5}$	29.1 $\pm$ 1.9 $^{+1.0}_{-1.9}$	5.1 $\pm$ 0.7 $^{+0.5}_{-0.9}$
LP2	+0 -98	+65 -0	+33 -0	+0.00 -1.46	+0.97 -0.00	+0.49 -0.00
LP4	+106 -0	+0 -87	+0 -22	+1.60 -0.00	+0.00 -1.28	+0.00 -0.33
LP5	+145 -0	+0 -93	+0 -53	+2.16 -0.00	+0.00 -1.37	+0.00 -0.79
117 - 118	4431 $\pm$ 124 $^{+194}_{-103}$	1878 $\pm$ 116 $^{+81}_{-179}$	297 $\pm$ 35 $^{+20}_{-21}$	67.1 $\pm$ 1.8 $^{+3.0}_{-1.5}$	28.4 $\pm$ 1.8 $^{+1.2}_{-2.7}$	4.5 $\pm$ 0.6 $^{+0.3}_{-0.3}$
LP2	+0 -103	+81 -0	+20 -0	+0.00 -1.53	+1.23 -0.00	+0.30 -0.00
LP4	+104 -0	+0 -101	+0 -3	+1.58 -0.00	+0.00 -1.53	+0.00 -0.05
LP5	+163 -0	+0 -147	+0 -21	+2.52 -0.00	+0.00 -2.21	+0.00 -0.31
118 - 119	4086 $\pm$ 124 $^{+215}_{-48}$	1913 $\pm$ 118 $^{+17}_{-191}$	293 $\pm$ 35 $^{+31}_{-30}$	64.9 $\pm$ 2.0 $^{+3.5}_{-0.8}$	30.4 $\pm$ 1.9 $^{+0.3}_{-3.0}$	4.7 $\pm$ 0.7 $^{+0.5}_{-0.5}$
LP2	+0 -48	+17 -0	+31 -0	+0.00 -0.77	+0.27 -0.00	+0.49 -0.00
LP4	+102 -0	+0 -94	+0 -10	+1.64 -0.00	+0.00 -1.48	+0.00 -0.16
LP5	+190 -0	+0 -166	+0 -28	+3.06 -0.00	+0.00 -2.62	+0.00 -0.44
119 - 120	3756 $\pm$ 120 $^{+213}_{-109}$	1954 $\pm$ 118 $^{+80}_{-192}$	283 $\pm$ 36 $^{+32}_{-24}$	62.7 $\pm$ 2.0 $^{+3.6}_{-1.9}$	32.6 $\pm$ 2.0 $^{+1.3}_{-3.2}$	4.7 $\pm$ 0.7 $^{+0.5}_{-0.4}$
LP2	+0 -109	+80 -0	+32 -0	+0.00 -1.85	+1.32 -0.00	+0.53 -0.00
LP4	+114 -0	+0 -112	+0 -3	+1.92 -0.00	+0.00 -1.86	+0.00 -0.05
LP5	+179 -0	+0 -156	+0 -23	+2.99 -0.00	+0.00 -2.60	+0.00 -0.39
120 - 121	3908 $\pm$ 119 $^{+145}_{-54}$	1674 $\pm$ 112 $^{+112}_{-107}$	273 $\pm$ 35 $^{+41}_{-42}$	66.8 $\pm$ 2.0 $^{+2.5}_{-0.9}$	28.6 $\pm$ 2.0 $^{+0.2}_{-0.7}$	4.7 $\pm$ 0.7 $^{+0.7}_{-0.7}$
LP2	+0 -54	+12 -0	+41 -0	+0.00 -0.91	+0.20 -0.00	+0.71 -0.00
LP4	+55 -0	+0 -35	+0 -23	+0.97 -0.00	+0.00 -0.58	+0.00 -0.38
LP5	+135 -0	+0 -102	+0 -35	+2.33 -0.00	+0.00 -1.72	+0.00 -0.60
121 - 122	3865 $\pm$ 118 $^{+114}_{-125}$	1646 $\pm$ 111 $^{+132}_{-58}$	278 $\pm$ 34 $^{+0}_{-61}$	66.8 $\pm$ 2.0 $^{+2.0}_{-1.2}$	28.4 $\pm$ 2.0 $^{+1.0}_{-1.0}$	4.8 $\pm$ 0.7 $^{+0.0}_{-1.1}$
LP2	+0 -125	+132 -0	+0 -4	+0.00 -2.19	+2.26 -0.00	+0.00 -0.07
LP4	+55 -0	+0 -17	+0 -39	+0.96 -0.00	+0.00 -0.29	+0.00 -0.67
LP5	+100 -0	+0 -55	+0 -47	+1.75 -0.00	+0.00 -0.94	+0.00 -0.81
122 - 123	3642 $\pm$ 113 $^{+112}_{-86}$	1569 $\pm$ 105 $^{+70}_{-71}$	248 $\pm$ 31 $^{+17}_{-42}$	66.7 $\pm$ 2.0 $^{+2.0}_{-1.6}$	28.7 $\pm$ 2.0 $^{+1.3}_{-1.3}$	4.5 $\pm$ 0.7 $^{+0.3}_{-0.8}$
LP2	+0 -86	+70 -0	+17 -0	+0.00 -1.58	+1.27 -0.00	+0.31 -0.00
LP4	+43 -0	+0 -13	+0 -27	+0.75 -0.00	+0.00 -0.25	+0.00 -0.50
LP5	+104 -0	+0 -70	+0 -33	+1.89 -0.00	+0.00 -1.29	+0.00 -0.60
123 - 124	3676 $\pm$ 112 $^{+167}_{-96}$	1514 $\pm$ 104 $^{+85}_{-122}$	285 $\pm$ 35 $^{+11}_{-50}$	67.1 $\pm$ 2.0 $^{+3.1}_{-1.7}$	27.7 $\pm$ 2.0 $^{+1.5}_{-2.2}$	5.2 $\pm$ 0.7 $^{+0.2}_{-0.9}$
LP2	+0 -96	+85 -0	+11 -0	+0.00 -1.75	+1.55 -0.00	+0.20 -0.00
LP4	+78 -0	+0 -59	+0 -23	+1.48 -0.00	+0.00 -1.06	+0.00 -0.42
LP5	+148 -0	+0 -107	+0 -44	+2.74 -0.00	+0.00 -1.93	+0.00 -0.81
124 - 125	3640 $\pm$ 110 $^{+155}_{-81}$	1525 $\pm$ 100 $^{+63}_{-129}$	180 $\pm$ 27 $^{+20}_{-20}$	68.1 $\pm$ 2.0 $^{+2.8}_{-1.5}$	28.5 $\pm$ 1.9 $^{+1.2}_{-2.4}$	3.4 $\pm$ 0.6 $^{+0.4}_{-0.4}$
LP2	+0 -81	+63 -0	+20 -0	+0.00 -1.54	+1.18 -0.00	+0.37 -0.00
LP4	+87 -0	+0 -74	+0 -9	+1.58 -0.00	+0.00 -1.41	+0.00 -0.17
LP5	+128 -0	+0 -106	+0 -18	+2.34 -0.00	+0.00 -2.00	+0.00 -0.34
126 - 127	3516 $\pm$ 106 $^{+181}_{-98}$	1490 $\pm$ 92 $^{+76}_{-161}$	122 $\pm$ 32 $^{+21}_{-18}$	68.6 $\pm$ 1.9 $^{+3.5}_{-1.9}$	29.1 $\pm$ 1.9 $^{+1.5}_{-3.2}$	2.4 $\pm$ 0.5 $^{+0.4}_{-0.3}$
LP2	+0 -98	+76 -0	+21 -0	+0.00 -1.90	+1.49 -0.00	+0.40 -0.00
LP4	+94 -0	+0 -87	+0 -4	+1.80 -0.00	+0.00 -1.71	+0.00 -0.08
LP5	+155 -0	+0 -135	+0 -17	+2.98 -0.00	+0.00 -2.65	+0.00 -0.34
127 - 128	3344 $\pm$ 105 $^{+100}_{-62}$	1292 $\pm$ 95 $^{+44}_{-62}$	217 $\pm$ 29 $^{+20}_{-37}$	68.9 $\pm$ 2.1 $^{+2.0}_{-1.3}$	26.6 $\pm$ 2.0 $^{+0.9}_{-1.3}$	4.5 $\pm$ 0.7 $^{+0.4}_{-0.8}$
LP2	+0 -62	+44 -0	+20 -0	+0.00 -1.31	+0.90 -0.00	+0.41 -0.00
LP4	+52 -0	+0 -40	+0 -9	+1.03 -0.00	+0.00 -0.84	+0.00 -0.19
LP5	+85 -0	+0 -47	+0 -36	+1.73 -0.00	+0.00 -0.98	+0.00 -0.75
128 - 129	3193 $\pm$ 101 $^{+64}_{-50}$	1280 $\pm$ 90 $^{+32}_{-55}$	158 $\pm$ 25 $^{+19}_{-11}$	69.0 $\pm$ 2.1 $^{+1.4}_{-1.1}$	27.6 $\pm$ 2.0 $^{+0.7}_{-1.2}$	3.4 $\pm$ 0.6 $^{+0.4}_{-0.2}$
LP2	+0 -50	+32 -0	+19 -0	+0.00 -1.10	+0.69 -0.00	+0.40 -0.00
LP4	+22 -0	+0 -14	+0 -9	+0.48 -0.00	+0.00 -0.30	+0.00 -0.18
LP5	+60 -0	+0 -53	+0 -7	+1.29 -0.00	+0.00 -1.15	+0.00 -0.14
130 - 131	3010 $\pm$ 99 $^{+111}_{-60}$	1201 $\pm$ 89 $^{+50}_{-82}$	163 $\pm$ 25 $^{+10}_{-31}$	68.8 $\pm$ 2.2 $^{+2.6}_{-1.4}$	27.5 $\pm$ 2.1 $^{+1.1}_{-1.9}$	3.7 $\pm$ 0.7 $^{+0.2}_{-0.7}$
LP2	+0 -60	+50 -0	+10 -0	+0.00 -1.38	+1.15 -0.00	+0.24 -0.00
LP4	+46 -0	+0 -28	+0 -19	+1.06 -0.00	+0.00 -0.63	+0.00 -0.43
LP5	+101 -0	+0 -78	+0 -24	+2.32 -0.00	+0.00 -1.77	+0.00 -0.55
131 - 132	2894 $\pm$ 95 $^{+47}_{-44}$	1095 $\pm$ 85 $^{+31}_{-21}$	152 $\pm$ 24 $^{+24}_{-36}$	69.9 $\pm$ 2.2 $^{+1.1}_{-1.1}$	26.5 $\pm$ 2.1 $^{+0.7}_{-0.5}$	3.7 $\pm$ 0.7 $^{+0.6}_{-0.9}$
LP2	+0 -44	+21 -0	+24 -0	+0.00 -1.09	+0.51 -0.00	+0.58 -0.00

	Yield $\pm$ stat. $\pm$ syst.			Fraction $\pm$ stat. $\pm$ syst. [%]		
	$\gamma\gamma$	$\gamma$ -jet	jet-jet	$\gamma\gamma$	$\gamma$ -jet	jet-jet
<i>Inclusive</i>						
105 - 160	170929 $\pm$ 780 $^{+7009}_{-3814}$	74487 $\pm$ 728 $^{+2779}_{-5594}$	10984 $\pm$ 217 $^{+1050}_{-1484}$	66.7 $\pm$ 0.3 $^{+2.8}_{-1.5}$	29.1 $\pm$ 0.3 $^{+1.1}_{-2.2}$	4.3 $\pm$ 0.1 $^{+0.4}_{-0.6}$
LP2	+0 -3814	+2779 -0	+1050 -0	+0.00 -1.49	+1.08 -0.00	+0.41 -0.00
LP4	+3407 -0	+0 -2749	+0 -698	+1.34 -0.00	+0.00 -1.07	+0.00 -0.27
LP5	+6125 -0	+0 -4872	+0 -1310	+2.40 -0.00	+0.00 -1.89	+0.00 -0.51
$\mu$						
16 - 17	0 $\pm$ 2 $^{+0}_{-0}$	3 $\pm$ 3 $^{+0}_{-0}$	0 $\pm$ 0 $^{+0}_{-0}$	0.0 $\pm$ 61.1 $^{+0.9}_{-0.0}$	99.9 $\pm$ 61.2 $^{+0.0}_{-0.9}$	0.1 $\pm$ 0.3 $^{+0.0}_{-0.0}$
LP2	+0 -0	+0 -0	+0 -0	+0.00 -0.00	+0.00 -0.01	+0.01 -0.00
LP4	+0 -0	+0 -0	+0 -0	+0.89 -0.00	+0.00 -0.89	+0.00 -0.00
LP5	+0 -0	+0 -0	+0 -0	+0.03 -0.00	+0.00 -0.02	+0.00 -0.00
17 - 18	0 $\pm$ 1 $^{+0}_{-0}$	1 $\pm$ 3 $^{+0}_{-0}$	1 $\pm$ 1 $^{+0}_{-0}$	14.9 $\pm$ 82.8 $^{+7.8}_{-14.5}$	37.0 $\pm$ 121.4 $^{+14.1}_{-21.4}$	48.1 $\pm$ 109.5 $^{+13.6}_{-0.0}$
LP2	+0 -0	+0 -0	+0 -0	+0.00 -14.46	+14.07 -0.00	+0.38 -0.00
LP4	+0 -0	+0 -0	+0 -0	+5.56 -0.00	+0.00 -15.21	+9.65 -0.00
LP5	+0 -0	+0 -0	+0 -0	+5.47 -0.00	+0.00 -15.05	+9.58 -0.00
18 - 19	0 $\pm$ 0 $^{+0}_{-0}$	0 $\pm$ 0 $^{+0}_{-0}$	0 $\pm$ 0 $^{+0}_{-0}$	0.0 $\pm$ 0.0 $^{+0.0}_{-0.0}$	0.0 $\pm$ 0.0 $^{+0.0}_{-0.0}$	0.0 $\pm$ 0.0 $^{+0.0}_{-0.0}$
LP2	+0 -0	+0 -0	+0 -0	+0.00 -0.00	+0.00 -0.00	+0.00 -0.00
LP4	+0 -0	+0 -0	+0 -0	+0.00 -0.00	+0.00 -0.00	+0.00 -0.00
LP5	+0 -0	+0 -0	+0 -0	+0.00 -0.00	+0.00 -0.00	+0.00 -0.00
19 - 20	113 $\pm$ 18 $^{+2}_{-3}$	43 $\pm$ 14 $^{+2}_{-2}$	3 $\pm$ 3 $^{+1}_{-1}$	71.2 $\pm$ 9.8 $^{+1.6}_{-1.8}$	26.9 $\pm$ 9.7 $^{+1.5}_{-1.3}$	1.8 $\pm$ 2.0 $^{+0.5}_{-0.5}$
LP2	+0 -3	+2 -0	+1 -0	+0.00 -1.67	+1.15 -0.00	+0.52 -0.00
LP4	+2 -0	+0 -2	+0 -0	+1.63 -0.00	+0.00 -1.33	+0.00 -0.30
LP5	+0 -1	+1 -0	+0 -1	+0.00 -0.63	+1.03 -0.00	+0.00 -0.41
20 - 21	205 $\pm$ 22 $^{+13}_{-8}$	45 $\pm$ 18 $^{+6}_{-12}$	9 $\pm$ 6 $^{+2}_{-0}$	79.1 $\pm$ 7.6 $^{+4.7}_{-3.1}$	17.4 $\pm$ 7.4 $^{+2.5}_{-4.9}$	3.5 $\pm$ 2.5 $^{+0.7}_{-0.0}$
LP2	+0 -8	+6 -0	+2 -0	+0.00 -3.14	+2.45 -0.00	+0.69 -0.00
LP4	+7 -0	+0 -6	+0 -0	+2.53 -0.00	+0.00 -2.49	+0.00 -0.03
LP5	+11 -0	+0 -11	+1 -0	+3.94 -0.00	+0.00 -4.18	+0.24 -0.00
21 - 22	152 $\pm$ 20 $^{+6}_{-0}$	45 $\pm$ 21 $^{+5}_{-0}$	10 $\pm$ 13 $^{+0}_{-0}$	73.6 $\pm$ 11.3 $^{+2.9}_{-0.0}$	21.8 $\pm$ 10.5 $^{+2.5}_{-5.1}$	4.6 $\pm$ 6.5 $^{+3.0}_{-3.6}$
LP2	+0 -0	+0 -10	+10 -0	+0.03 -0.00	+0.00 -5.08	+5.04 -0.00
LP4	+0 -0	+5 -0	+0 -5	+0.08 -0.00	+2.51 -0.00	+0.00 -2.58
LP5	+6 -0	+0 -1	+0 -5	+2.94 -0.00	+0.00 -0.41	+0.00 -2.53
22 - 23	165 $\pm$ 23 $^{+0}_{-4}$	43 $\pm$ 23 $^{+5}_{-2}$	19 $\pm$ 9 $^{+3}_{-1}$	72.6 $\pm$ 10.6 $^{+0.0}_{-1.6}$	19.0 $\pm$ 10.2 $^{+2.0}_{-0.7}$	8.4 $\pm$ 4.9 $^{+1.5}_{-0.6}$
LP2	+0 -2	+0 -2	+3 -0	+0.00 -0.71	+0.00 -0.75	+1.46 -0.00
LP4	+0 -2	+2 -0	+0 -0	+0.00 -0.75	+0.96 -0.00	+0.00 -0.22
LP5	+0 -3	+4 -0	+0 -1	+0.00 -1.26	+1.79 -0.00	+0.00 -0.52
23 - 24	178 $\pm$ 24 $^{+7}_{-0}$	62 $\pm$ 23 $^{+0}_{-7}$	16 $\pm$ 8 $^{+2}_{-2}$	69.7 $\pm$ 9.3 $^{+2.9}_{-0.0}$	24.1 $\pm$ 9.0 $^{+0.0}_{-2.6}$	6.2 $\pm$ 3.7 $^{+0.9}_{-0.8}$
LP2	+0 -0	+0 -2	+2 -0	+0.00 -0.00	+0.00 -0.87	+0.88 -0.00
LP4	+6 -0	+0 -6	+0 -0	+2.42 -0.00	+0.00 -2.29	+0.00 -0.13
LP5	+4 -0	+0 -2	+0 -2	+1.61 -0.00	+0.00 -0.86	+0.00 -0.75
24 - 25	206 $\pm$ 21 $^{+9}_{-2}$	61 $\pm$ 15 $^{+2}_{-12}$	1 $\pm$ 1 $^{+4}_{-0}$	76.9 $\pm$ 6.1 $^{+3.2}_{-0.9}$	22.7 $\pm$ 6.1 $^{+0.8}_{-4.6}$	0.4 $\pm$ 0.3 $^{+1.5}_{-0.0}$
LP2	+0 -2	+2 -0	+0 -0	+0.00 -0.92	+0.75 -0.00	+0.17 -0.00
LP4	+5 -0	+0 -7	+3 -0	+1.77 -0.00	+0.00 -2.73	+0.96 -0.00
LP5	+7 -0	+0 -10	+3 -0	+2.63 -0.00	+0.00 -3.73	+1.10 -0.00
25 - 26	304 $\pm$ 29 $^{+15}_{-1}$	108 $\pm$ 24 $^{+1}_{-10}$	7 $\pm$ 6 $^{+0}_{-4}$	72.6 $\pm$ 6.1 $^{+3.4}_{-0.1}$	25.7 $\pm$ 6.0 $^{+0.2}_{-2.5}$	1.7 $\pm$ 1.5 $^{+0.0}_{-0.9}$
LP2	+0 -1	+1 -0	+0 -0	+0.00 -0.13	+0.19 -0.00	+0.00 -0.06
LP4	+9 -0	+0 -6	+0 -2	+2.03 -0.00	+0.00 -1.55	+0.00 -0.48
LP5	+12 -0	+0 -8	+0 -3	+2.73 -0.00	+0.00 -1.99	+0.00 -0.74
26 - 27	414 $\pm$ 42 $^{+17}_{-30}$	176 $\pm$ 42 $^{+39}_{-4}$	45 $\pm$ 14 $^{+0}_{-17}$	65.2 $\pm$ 6.8 $^{+2.7}_{-4.7}$	27.7 $\pm$ 6.7 $^{+6.2}_{-0.7}$	7.1 $\pm$ 2.7 $^{+0.0}_{-2.7}$
LP2	+0 -30	+39 -0	+0 -9	+0.00 -4.69	+6.09 -0.00	+0.00 -1.40
LP4	+0 -2	+8 -0	+0 -7	+0.00 -0.25	+1.28 -0.00	+0.00 -1.03
LP5	+17 -0	+0 -4	+0 -13	+2.71 -0.00	+0.00 -0.71	+0.00 -2.00
27 - 28	617 $\pm$ 47 $^{+45}_{-12}$	319 $\pm$ 43 $^{+3}_{-50}$	26 $\pm$ 11 $^{+11}_{-0}$	64.1 $\pm$ 4.7 $^{+4.6}_{-1.2}$	33.2 $\pm$ 4.6 $^{+0.3}_{-5.3}$	2.7 $\pm$ 1.3 $^{+1.2}_{-0.0}$
LP2	+0 -12	+3 -0	+9 -0	+0.00 -1.24	+0.34 -0.00	+0.90 -0.00
LP4	+26 -0	+0 -32	+6 -0	+2.63 -0.00	+0.00 -3.30	+0.67 -0.00
LP5	+37 -0	+0 -39	+3 -0	+3.76 -0.00	+0.00 -4.09	+0.33 -0.00
28 - 29	2307 $\pm$ 87 $^{+134}_{-57}$	991 $\pm$ 77 $^{+42}_{-136}$	102 $\pm$ 20 $^{+18}_{-1}$	67.9 $\pm$ 2.4 $^{+3.9}_{-1.7}$	29.1 $\pm$ 2.4 $^{+1.2}_{-4.0}$	3.0 $\pm$ 0.7 $^{+0.5}_{-0.0}$
LP2	+0 -57	+42 -0	+16 -0	+0.00 -1.70	+1.23 -0.00	+0.47 -0.00
LP4	+64 -0	+0 -70	+7 -0	+1.85 -0.00	+0.00 -2.06	+0.21 -0.00
LP5	+118 -0	+0 -116	+0 -1	+3.47 -0.00	+0.00 -3.42	+0.00 -0.04
29 - 30	2997 $\pm$ 99 $^{+178}_{-69}$	1160 $\pm$ 91 $^{+49}_{-167}$	171 $\pm$ 27 $^{+19}_{-7}$	69.2 $\pm$ 2.2 $^{+4.0}_{-1.6}$	26.8 $\pm$ 2.2 $^{+1.1}_{-3.9}$	4.0 $\pm$ 0.7 $^{+0.4}_{-0.2}$
LP2	+0 -69	+49 -0	+19 -0	+0.00 -1.57	+1.13 -0.00	+0.44 -0.00
LP4	+81 -0	+0 -74	+0 -5	+1.83 -0.00	+0.00 -1.71	+0.00 -0.12
LP5	+158 -0	+0 -150	+0 -4	+3.60 -0.00	+0.00 -3.49	+0.00 -0.10
30 - 31	1955 $\pm$ 79 $^{+113}_{-45}$	763 $\pm$ 70 $^{+31}_{-112}$	108 $\pm$ 20 $^{+15}_{-1}$	69.2 $\pm$ 2.7 $^{+4.0}_{-1.6}$	27.0 $\pm$ 2.6 $^{+1.1}_{-4.0}$	3.8 $\pm$ 0.8 $^{+0.5}_{-0.0}$
LP2	+0 -45	+31 -0	+15 -0	+0.00 -1.59	+1.08 -0.00	+0.51 -0.00
LP4	+60 -0	+0 -58	+0 -1	+2.09 -0.00	+0.00 -2.05	+0.00 -0.04
LP5	+96 -0	+0 -96	+0 -0	+3.39 -0.00	+0.00 -3.39	+0.00 -0.00
31 - 32	1948 $\pm$ 86 $^{+82}_{-45}$	906 $\pm$ 81 $^{+31}_{-56}$	139 $\pm$ 24 $^{+13}_{-25}$	65.1 $\pm$ 2.8 $^{+2.7}_{-1.5}$	30.3 $\pm$ 2.8 $^{+1.0}_{-1.9}$	4.6 $\pm$ 1.0 $^{+0.4}_{-0.8}$
LP2	+0 -45	+31 -0	+13 -0	+0.00 -1.49	+1.05 -0.00	+0.45 -0.00
LP4	+30 -0	+0 -16	+0 -14	+1.00 -0.00	+0.00 -0.53	+0.00 -0.47
LP5	+77 -0	+0 -54	+0 -21	+2.52 -0.00	+0.00 -1.82	+0.00 -0.69
32 - 33	2723 $\pm$ 92 $^{+85}_{-56}$	879 $\pm$ 86 $^{+45}_{-42}$	200 $\pm$ 29 $^{+13}_{-47}$	71.6 $\pm$ 2.4 $^{+2.2}_{-1.5}$	23.1 $\pm$ 2.3 $^{+1.2}_{-1.1}$	5.3 $\pm$ 0.9 $^{+0.3}_{-1.2}$
LP2	+0 -56	+45 -0	+13 -0	+0.00 -1.50	+1.16 -0.00	+0.34 -0.00
LP4	+57 -0	+0 -37	+0 -19	+1.48 -0.00	+0.00 -0.98	+0.00 -0.50
LP5	+64 -0	+0 -19	+0 -43	+1.65 -0.00	+0.00 -0.51	+0.00 -1.14
33 - 34	2841 $\pm$ 93 $^{+167}_{-71}$	1087 $\pm$ 80 $^{+61}_{-164}$	148 $\pm$ 23 $^{+12}_{-3}$	69.7 $\pm$ 2.1 $^{+4.1}_{-1.8}$	26.7 $\pm$ 2.1 $^{+1.5}_{-4.0}$	3.6 $\pm$ 0.7 $^{+0.3}_{-0.1}$
LP2	+0 -71	+61 -0	+12 -0	+0.00 -1.79	+1.49 -0.00	+0.30 -0.00
LP4	+89 -0	+0 -83	+0 -3	+2.14 -0.00	+0.00 -2.06	+0.00 -0.08
LP5	+141 -0	+0 -141	+0 -0	+3.45 -0.00	+0.00 -3.46	+0.01 -0.00
34 - 35	2654 $\pm$ 98 $^{+95}_{-46}$	1177 $\pm$ 90 $^{+12}_{-59}$	149 $\pm$ 25 $^{+33}_{-40}$	66.7 $\pm$ 2.4 $^{+2.4}_{-1.1}$	29.6 $\pm$ 2.3 $^{+0.3}_{-1.5}$	3.7 $\pm$ 0.7 $^{+0.8}_{-1.0}$
LP2	+0 -46	+12 -0	+33 -0	+0.00 -1.13	+0.30 -0.00	+0.83 -0.00
LP4	+38 -0	+0 -24	+0 -15	+0.97 -0.00	+0.00 -0.60	+0.00 -0.37
LP5	+87 -0	+0 -53	+0 -3	+2.25 -0.00	+0.00 -1.32	+0.00 -0.93
35 - 36	3388 $\pm$ 110 $^{+123}_{-74}$	1499 $\pm$ 102 $^{+61}_{-65}$	221 $\pm$ 30 $^{+15}_{-57}$	66.3 $\pm$ 2.1 $^{+2.4}_{-1.5}$	29.3 $\pm$ 2.1 $^{+1.2}_{-1.3}$	4.3 $\pm$ 0.7 $^{+0.3}_{-1.1}$
LP2	+0 -74	+60 -0	+15 -0	+0.00 -1.46	+1.17 -0.00	+0.29 -0.00
LP4	+64 -0	+0 -32	+0 -31	+1.23 -0.00	+0.00 -0.63	+0.00 -0.60
LP5	+105 -0	+0 -57	+0 -48	+2.06 -0.00	+0.00 -1.12	+0.00 -0.94
37 - 38	3810 $\pm$ 111 $^{+132}_{-71}$	1482 $\pm$ 104 $^{+53}_{-77}$	294 $\pm$ 37 $^{+19}_{-61}$	68.2 $\pm$ 2.0 $^{+2.4}_{-1.3}$	26.5 $\pm$ 1.9 $^{+0.9}_{-1.4}$	5.3 $\pm$ 0.8 $^{+0.3}_{-1.1}$
LP2	+0 -71	+53 -0	+19 -0	+0.00 -1.28	+0.94 -0.00	+0.34 -0.00
LP4	+79 -0	+0 -56	+0 -24	+1.42 -0.00	+0.00 -1.00	+0.00 -0.42
LP5	+105 -0	+0 -53	+0 -57	+1.94 -0.00	+0.00 -0.93	+0.00 -1.01
38 - 39	3777 $\pm$ 109 $^{+112}_{-94}$	1476 $\pm$ 97 $^{+62}_{-62}$	206 $\pm$ 28 $^{+32}_{-57}$	69.2 $\pm$ 1.9 $^{+2.1}_{-1.7}$	27.0 $\pm$ 1.8 $^{+1.1}_{-1.1}$	3.8 $\pm$ 0.6 $^{+0.6}_{-1.0}$
LP2	+0 -94	+62 -0	+32 -0	+0.00 -1.72	+1.14 -0.00	+0.58 -0.00
LP4	+52 -0	+0 -27	+0 -31	+1.02 -0.00	+0.00 -0.46	+0.00 -0.56
LP5	+99 -0	+0 -56	+0 -48	+1.88 -0.00	+0.00 -1.00	+0.00 -0.88
39 - 40	3901 $\pm$ 112 $^{+114}_{-87}$	1552 $\pm$ 100 $^{+70}_{-105}$	199 $\pm$ 28 $^{+17}_{-13}$	69.0 $\pm$ 1.9 $^{+2.1}_{-1.5}$	27.5 $\pm$ 1.8 $^{+1.2}_{-1.8}$	3.5 $\pm$ 0.6 $^{+0.3}_{-0.2}$
LP2	+0 -87	+70 -0	+17 -0	+0.00 -1.55	+1.24 -0.00	+0.31 -0.00
LP4	+50 -0	+0 -45	+0 -7	+0.92 -0.00	+0.00 -0.80	+0.00 -0.12
LP5	+102 -0	+0 -94	+0 -11	+1.85 -0.00	+0.00 -1.65	+0.00 -0.20
41 - 42	4096 $\pm$ 114 $^{+110}_{-71}$	1471 $\pm$ 103 $^{+65}_{-60}$	254 $\pm$ 32 $^{+20}_{-40}$	70.4 $\pm$ 1.9 $^{+1.9}_{-1.1}$	25.3 $\pm$ 1.8 $^{+1.1}_{-1.1}$	4.4 $\pm$ 0.6 $^{+0.3}_{-0.3}$

	Yield $\pm$ stat. $\pm$ syst.			Fraction $\pm$ stat. $\pm$ syst. [%]		
	$\gamma\gamma$	$\gamma$ -jet	jet-jet	$\gamma\gamma$	$\gamma$ -jet	jet-jet
$N_{jets}(30 GeV)$						
$N_{jets} = 0$	95582 $\pm$ 583 $^{+3764}_{-1550}$	46751 $\pm$ 495 $^{+566}_{-2449}$	8246 $\pm$ 161 $^{+892}_{-1301}$	63.5 $\pm$ 0.4 $^{+2.5}_{-1.0}$	31.0 $\pm$ 0.4 $^{+0.4}_{-1.6}$	5.5 $\pm$ 0.1 $^{+0.6}_{-0.9}$
LP2	+0 -1550	+566 -0	+892 -0	+0.00 -0.99	+0.40 -0.00	+0.60 -0.00
LP4	+1878 -0	+0 -1263	+0 -608	+1.24 -0.00	+0.00 -0.84	+0.00 -0.40
LP5	+3263 -0	+0 -2098	+0 -1150	+2.16 -0.00	+0.00 -1.40	+0.00 -0.76
$N_{jets} = 1$	47357 $\pm$ 382 $^{+1645}_{-1053}$	17335 $\pm$ 342 $^{+797}_{-1315}$	2209 $\pm$ 99 $^{+259}_{-344}$	70.8 $\pm$ 0.5 $^{+2.5}_{-1.6}$	25.9 $\pm$ 0.5 $^{+1.2}_{-2.0}$	3.3 $\pm$ 0.2 $^{+0.4}_{-0.5}$
LP2	+0 -1053	+797 -0	+259 -0	+0.00 -1.58	+1.19 -0.00	+0.39 -0.00
LP4	+810 -0	+0 -643	+0 -176	+1.22 -0.00	+0.00 -0.96	+0.00 -0.26
LP5	+1432 -0	+0 -1148	+0 -296	+2.15 -0.00	+0.00 -1.71	+0.00 -0.44
$N_{jets} = 2$	19327 $\pm$ 232 $^{+587}_{-470}$	6199 $\pm$ 200 $^{+405}_{-581}$	679 $\pm$ 55 $^{+71}_{-21}$	73.8 $\pm$ 0.8 $^{+2.3}_{-1.8}$	23.7 $\pm$ 0.8 $^{+1.5}_{-2.2}$	2.6 $\pm$ 0.2 $^{+0.3}_{-0.1}$
LP2	+0 -470	+405 -0	+70 -0	+0.00 -1.81	+1.54 -0.00	+0.27 -0.00
LP4	+276 -0	+0 -288	+7 -0	+1.07 -0.00	+0.00 -1.09	+0.03 -0.00
LP5	+518 -0	+0 -505	+0 -21	+2.00 -0.00	+0.00 -1.92	+0.00 -0.08
$N_{jets} \geq 3$	6599 $\pm$ 128 $^{+173}_{-119}$	1901 $\pm$ 105 $^{+94}_{-134}$	164 $\pm$ 27 $^{+25}_{-41}$	76.2 $\pm$ 1.3 $^{+2.0}_{-1.4}$	21.9 $\pm$ 1.3 $^{+1.1}_{-1.5}$	1.9 $\pm$ 0.3 $^{+0.3}_{-0.5}$
LP2	+0 -119	+94 -0	+25 -0	+0.00 -1.37	+1.08 -0.00	+0.29 -0.00
LP4	+72 -0	+0 -50	+0 -23	+0.84 -0.00	+0.00 -0.57	+0.00 -0.27
LP5	+157 -0	+0 -124	+0 -33	+1.82 -0.00	+0.00 -1.43	+0.00 -0.39
Can't understand region label	3046 $\pm$ 84 $^{+92}_{-58}$	750 $\pm$ 67 $^{+53}_{-90}$	78 $\pm$ 18 $^{+5}_{-2}$	78.6 $\pm$ 1.9 $^{+2.3}_{-1.5}$	19.4 $\pm$ 1.8 $^{+1.4}_{-2.3}$	2.0 $\pm$ 0.5 $^{+0.1}_{-0.1}$
LP2	+0 -58	+53 -0	+5 -0	+0.00 -1.50	+1.36 -0.00	+0.14 -0.00
LP4	+33 -0	+0 -30	+0 -2	+0.83 -0.00	+0.00 -0.77	+0.00 -0.06
LP5	+86 -0	+0 -85	+0 -0	+2.20 -0.00	+0.00 -2.19	+0.00 -0.00
$p_T^{\gamma\gamma}[GeV]$						
0 - 5	10803 $\pm$ 139 $^{+163}_{-119}$	1910 $\pm$ 73 $^{+58}_{-4}$	695 $\pm$ 45 $^{+29}_{-148}$	80.6 $\pm$ 0.7 $^{+1.1}_{-0.7}$	14.2 $\pm$ 0.6 $^{+0.5}_{-0.0}$	5.2 $\pm$ 0.4 $^{+0.2}_{-1.1}$
LP2	+0 -119	+58 -0	+29 -0	+0.00 -0.69	+0.46 -0.00	+0.23 -0.00
LP4	+84 -0	+0 -4	+0 -72	+0.58 -0.00	+0.00 -0.04	+0.00 -0.54
LP5	+140 -0	+0 -1	+0 -129	+0.98 -0.00	+0.00 -0.02	+0.00 -0.96
5 - 10	19350 $\pm$ 206 $^{+341}_{-235}$	5909 $\pm$ 132 $^{+51}_{-28}$	1657 $\pm$ 70 $^{+144}_{-306}$	71.9 $\pm$ 0.6 $^{+1.2}_{-0.8}$	22.0 $\pm$ 0.6 $^{+0.2}_{-0.1}$	6.2 $\pm$ 0.3 $^{+0.5}_{-1.1}$
LP2	+0 -235	+50 -0	+144 -0	+0.00 -0.76	+0.22 -0.00	+0.55 -0.00
LP4	+190 -0	+0 -28	+0 -138	+0.64 -0.00	+0.00 -0.12	+0.00 -0.52
LP5	+282 -0	+10 -0	+0 -273	+1.00 -0.00	+0.02 -0.00	+0.00 -1.02
10 - 15	18948 $\pm$ 278 $^{+937}_{-422}$	9549 $\pm$ 274 $^{+260}_{-751}$	1860 $\pm$ 89 $^{+161}_{-193}$	62.4 $\pm$ 0.9 $^{+3.1}_{-1.4}$	31.5 $\pm$ 0.9 $^{+0.9}_{-2.5}$	6.1 $\pm$ 0.4 $^{+0.5}_{-0.6}$
LP2	+0 -422	+260 -0	+161 -0	+0.00 -1.39	+0.86 -0.00	+0.53 -0.00
LP4	+497 -0	+0 -418	+0 -82	+1.64 -0.00	+0.00 -1.37	+0.00 -0.27
LP5	+795 -0	+0 -624	+0 -175	+2.63 -0.00	+0.00 -2.05	+0.00 -0.57
15 - 20	16788 $\pm$ 276 $^{+711}_{-377}$	10094 $\pm$ 273 $^{+260}_{-545}$	1706 $\pm$ 86 $^{+115}_{-185}$	58.7 $\pm$ 1.0 $^{+2.5}_{-1.3}$	35.3 $\pm$ 1.0 $^{+0.9}_{-1.9}$	6.0 $\pm$ 0.4 $^{+0.4}_{-0.6}$
LP2	+0 -377	+260 -0	+115 -0	+0.00 -1.32	+0.91 -0.00	+0.40 -0.00
LP4	+349 -0	+0 -285	+0 -73	+1.24 -0.00	+0.00 -0.99	+0.00 -0.25
LP5	+620 -0	+0 -465	+0 -170	+2.20 -0.00	+0.00 -1.61	+0.00 -0.59
20 - 25	14668 $\pm$ 246 $^{+758}_{-359}$	8490 $\pm$ 241 $^{+270}_{-640}$	1287 $\pm$ 75 $^{+86}_{-125}$	60.0 $\pm$ 1.0 $^{+3.1}_{-1.5}$	34.7 $\pm$ 1.0 $^{+1.1}_{-2.6}$	5.3 $\pm$ 0.4 $^{+0.4}_{-0.5}$
LP2	+0 -359	+270 -0	+86 -0	+0.00 -1.46	+1.11 -0.00	+0.35 -0.00
LP4	+318 -0	+0 -259	+0 -66	+1.32 -0.00	+0.00 -1.05	+0.00 -0.27
LP5	+688 -0	+0 -585	+0 -106	+2.82 -0.00	+0.00 -2.39	+0.00 -0.43
25 - 30	12699 $\pm$ 232 $^{+709}_{-264}$	7176 $\pm$ 223 $^{+166}_{-592}$	917 $\pm$ 64 $^{+97}_{-116}$	61.1 $\pm$ 1.1 $^{+3.4}_{-1.3}$	34.5 $\pm$ 1.1 $^{+0.8}_{-2.9}$	4.4 $\pm$ 0.4 $^{+0.5}_{-0.6}$
LP2	+0 -264	+166 -0	+97 -0	+0.00 -1.27	+0.80 -0.00	+0.47 -0.00
LP4	+357 -0	+0 -308	+0 -49	+1.72 -0.00	+0.00 -1.48	+0.00 -0.24
LP5	+612 -0	+0 -506	+0 -105	+2.94 -0.00	+0.00 -2.44	+0.00 -0.51
30 - 35	11059 $\pm$ 206 $^{+528}_{-282}$	5686 $\pm$ 193 $^{+186}_{-438}$	642 $\pm$ 53 $^{+92}_{-85}$	63.6 $\pm$ 1.2 $^{+3.0}_{-1.6}$	32.7 $\pm$ 1.1 $^{+1.1}_{-2.5}$	3.7 $\pm$ 0.4 $^{+0.5}_{-0.5}$
LP2	+0 -282	+186 -0	+92 -0	+0.00 -1.61	+1.08 -0.00	+0.53 -0.00
LP4	+299 -0	+0 -256	+0 -38	+1.70 -0.00	+0.00 -1.48	+0.00 -0.22
LP5	+435 -0	+0 -355	+0 -76	+2.49 -0.00	+0.00 -2.05	+0.00 -0.44
35 - 45	17606 $\pm$ 237 $^{+725}_{-344}$	7816 $\pm$ 218 $^{+224}_{-595}$	845 $\pm$ 60 $^{+119}_{-130}$	67.0 $\pm$ 0.9 $^{+2.8}_{-1.3}$	29.8 $\pm$ 0.9 $^{+0.9}_{-2.3}$	3.2 $\pm$ 0.3 $^{+0.5}_{-0.5}$
LP2	+0 -344	+224 -0	+119 -0	+0.00 -1.31	+0.86 -0.00	+0.45 -0.00
LP4	+332 -0	+0 -260	+0 -72	+1.26 -0.00	+0.00 -0.99	+0.00 -0.27
LP5	+644 -0	+0 -536	+0 -108	+2.45 -0.00	+0.00 -2.04	+0.00 -0.41
45 - 60	18343 $\pm$ 239 $^{+668}_{-476}$	6588 $\pm$ 210 $^{+308}_{-554}$	741 $\pm$ 59 $^{+77}_{-110}$	71.5 $\pm$ 0.9 $^{+2.6}_{-1.9}$	25.7 $\pm$ 0.9 $^{+1.6}_{-2.2}$	2.9 $\pm$ 0.3 $^{+0.3}_{-0.4}$
LP2	+0 -476	+398 -0	+77 -0	+0.00 -1.85	+1.55 -0.00	+0.30 -0.00
LP4	+352 -0	+0 -289	+0 -61	+1.37 -0.00	+0.00 -1.13	+0.00 -0.24
LP5	+568 -0	+0 -472	+0 -91	+2.20 -0.00	+0.00 -1.84	+0.00 -0.35
60 - 80	14341 $\pm$ 208 $^{+498}_{-356}$	4922 $\pm$ 183 $^{+292}_{-417}$	488 $\pm$ 49 $^{+59}_{-79}$	72.6 $\pm$ 1.0 $^{+2.5}_{-1.8}$	24.9 $\pm$ 1.0 $^{+1.5}_{-2.1}$	2.5 $\pm$ 0.3 $^{+0.3}_{-0.4}$
LP2	+0 -356	+292 -0	+59 -0	+0.00 -1.79	+1.49 -0.00	+0.30 -0.00
LP4	+264 -0	+0 -231	+0 -33	+1.34 -0.00	+0.00 -1.17	+0.00 -0.16
LP5	+423 -0	+0 -346	+0 -73	+2.13 -0.00	+0.00 -1.76	+0.00 -0.37
80 - 100	7813 $\pm$ 147 $^{+229}_{-144}$	2402 $\pm$ 123 $^{+105}_{-220}$	172 $\pm$ 29 $^{+41}_{-11}$	75.2 $\pm$ 1.3 $^{+2.2}_{-1.4}$	23.1 $\pm$ 1.2 $^{+1.0}_{-2.1}$	1.7 $\pm$ 0.3 $^{+0.4}_{-0.1}$
LP2	+0 -144	+105 -0	+41 -0	+0.00 -1.40	+1.00 -0.00	+0.39 -0.00
LP4	+101 -0	+0 -91	+0 -10	+0.97 -0.00	+0.00 -0.88	+0.00 -0.10
LP5	+205 -0	+0 -201	+0 -4	+1.97 -0.00	+0.00 -1.93	+0.00 -0.04
100 - 120	4033 $\pm$ 96 $^{+113}_{-102}$	945 $\pm$ 73 $^{+89}_{-99}$	75 $\pm$ 17 $^{+10}_{-10}$	79.8 $\pm$ 1.6 $^{+2.2}_{-2.0}$	18.7 $\pm$ 1.5 $^{+1.8}_{-2.0}$	1.5 $\pm$ 0.4 $^{+0.2}_{-0.2}$
LP2	+0 -102	+89 -0	+10 -0	+0.00 -1.97	+1.77 -0.00	+0.20 -0.00
LP4	+52 -0	+0 -43	+0 -7	+0.99 -0.00	+0.00 -0.86	+0.00 -0.13
LP5	+101 -0	+0 -90	+0 -7	+1.93 -0.00	+0.00 -1.79	+0.00 -0.15
120 - 140	2081 $\pm$ 67 $^{+161}_{-46}$	494 $\pm$ 50 $^{+46}_{-53}$	27 $\pm$ 10 $^{+1}_{-3}$	80.0 $\pm$ 2.1 $^{+2.2}_{-1.8}$	19.0 $\pm$ 2.0 $^{+1.8}_{-2.1}$	1.0 $\pm$ 0.4 $^{+0.0}_{-0.1}$
LP2	+0 -46	+46 -0	+1 -0	+0.00 -1.80	+1.77 -0.00	+0.02 -0.00
LP4	+32 -0	+0 -29	+0 -1	+1.17 -0.00	+0.00 -1.13	+0.00 -0.03
LP5	+52 -0	+0 -45	+0 -3	+1.87 -0.00	+0.00 -1.75	+0.00 -0.12
140 - 170	1624 $\pm$ 58 $^{+62}_{-29}$	360 $\pm$ 42 $^{+30}_{-56}$	19 $\pm$ 8 $^{+0}_{-1}$	81.1 $\pm$ 2.3 $^{+2.9}_{-1.4}$	18.0 $\pm$ 2.3 $^{+1.5}_{-2.9}$	0.9 $\pm$ 0.4 $^{+0.0}_{-0.0}$
LP2	+0 -29	+30 -0	+0 -1	+0.00 -1.45	+1.49 -0.00	+0.00 -0.04
LP4	+19 -0	+0 -17	+0 -0	+0.85 -0.00	+0.00 -0.85	+0.00 -0.01
LP5	+59 -0	+0 -54	+0 -0	+2.73 -0.00	+0.00 -2.73	+0.00 -0.00
170 - 200	798 $\pm$ 38 $^{+19}_{-18}$	148 $\pm$ 25 $^{+12}_{-15}$	7 $\pm$ 4 $^{+6}_{-0}$	83.7 $\pm$ 2.9 $^{+1.3}_{-1.8}$	15.5 $\pm$ 2.8 $^{+1.2}_{-1.7}$	0.8 $\pm$ 0.5 $^{+0.0}_{-0.0}$
LP2	+0 -18	+12 -0	+5 -0	+0.00 -1.85	+1.29 -0.00	+0.56 -0.00
LP4	+10 -0	+0 -10	+2 -0	+0.82 -0.00	+0.00 -1.05	+0.23 -0.00
LP5	+15 -0	+0 -12	+0 -0	+1.26 -0.00	+0.00 -1.27	+0.02 -0.00
200 - 250	600 $\pm$ 33 $^{+13}_{-20}$	100 $\pm$ 21 $^{+19}_{-11}$	6 $\pm$ 2 $^{+1}_{-1}$	85.0 $\pm$ 3.2 $^{+1.4}_{-2.7}$	14.2 $\pm$ 3.2 $^{+2.8}_{-1.5}$	0.8 $\pm$ 0.4 $^{+0.2}_{-0.1}$
LP2	+0 -17	+16 -0	+0 -1	+0.00 -2.19	+2.31 -0.00	+0.00 -0.12
LP4	+0 -11	+11 -0	+0 -0	+0.00 -1.56	+1.50 -0.00	+0.06 -0.00
LP5	+13 -0	+0 -11	+1 -0	+1.39 -0.00	+0.00 -1.55	+0.16 -0.00
250 - 300	252 $\pm$ 21 $^{+15}_{-6}$	44 $\pm$ 12 $^{+7}_{-13}$	3 $\pm$ 2 $^{+0}_{-3}$	84.4 $\pm$ 4.7 $^{+5.2}_{-1.9}$	14.6 $\pm$ 4.6 $^{+2.4}_{-4.3}$	0.9 $\pm$ 0.9 $^{+0.0}_{-1.0}$
LP2	+0 -6	+7 -0	+0 -2	+0.00 -1.86	+2.36 -0.00	+0.00 -0.50
LP4	+8 -0	+0 -8	+0 -1	+3.13 -0.00	+0.00 -2.64	+0.00 -0.48
LP5	+13 -0	+0 -10	+0 -2	+4.11 -0.00	+0.00 -3.41	+0.00 -0.70
300 - 450	139 $\pm$ 17 $^{+0}_{-7}$	41 $\pm$ 11 $^{+10}_{-0}$	2 $\pm$ 1 $^{+1}_{-1}$	76.4 $\pm$ 6.7 $^{+0.0}_{-4.5}$	22.6 $\pm$ 6.7 $^{+5.1}_{-0.0}$	1.0 $\pm$ 0.9 $^{+0.3}_{-0.8}$
LP2	+0 -3	+2 -0	+1 -0	+0.00 -1.61	+1.26 -0.00	+0.35 -0.00
LP4	+0 -6	+9 -0	+0 -1	+0.00 -4.08	+4.65 -0.00	+0.00 -0.58
LP5	+0 -0	+4 -0	+0 -1	+0.00 -1.13	+1.72 -0.00	+0.00 -0.59
450 - 650	37 $\pm$ 7 $^{+0}_{-2}$	6 $\pm$ 3 $^{+3}_{-0}$	0 $\pm$ 0 $^{+0}_{-0}$	86.0 $\pm$ 8.9 $^{+0.0}_{-6.0}$	13.7 $\pm$ 8.8 $^{+6.5}_{-0.0}$	0.4 $\pm$ 0.9 $^{+0.0}_{-0.6}$
LP2	+0 -1	+2 -0	+0 -0	+0.00 -3.11	+3.48 -0.00	+0.00 -0.37
LP4	+0 -2	+2 -0	+0 -0	+0.00 -4.47	+4.79 -0.00	+0.00 -0.32
LP5	+0 -1	+1 -0	+0 -0	+0.00 -2.46	+2.77 -0.00	+0.00 -0.31
650 - 13000	3 $\pm$ 4 $^{+1}_{-0}$	2 $\pm$ 2 $^{+0}_{-0}$	1 $\pm$ 1 $^{+2}_{-0}$	54.5 $\pm$ 57.5 $^{+9.0}_{-29.2}$	36.8 $\pm$ 53.6 $^{+7.7}_{-29.2}$	8.7 $\pm$ 19.6 $^{+25.3}_{-0.0}$

	Yield $\pm$ stat. $\pm$ syst.			Fraction $\pm$ stat. $\pm$ syst. [%]		
	$\gamma\gamma$	$\gamma$ -jet	jet-jet	$\gamma\gamma$	$\gamma$ -jet	jet-jet
$ y_{\gamma\gamma} $						
0.0 - 0.1	16106 $\pm 224$ $^{+716}_{-342}$	6906 $\pm 193$ $^{+253}_{-528}$	1020 $\pm 57$ $^{+89}_{-190}$	67.0 $\pm 0.9$ $^{+3.0}_{-1.4}$	28.7 $\pm 0.8$ $^{+1.1}_{-2.2}$	4.2 $\pm 0.3$ $^{+0.4}_{-0.8}$
LP2	+0 -342	+253 -0	+89 -0	+0.00 -1.42	+1.05 -0.00	+0.37 -0.00
LP4	+364 -0	+0 -258	+0 -106	+1.52 -0.00	+0.00 -1.07	+0.00 -0.44
LP5	+617 -0	+0 -461	+0 -158	+2.57 -0.00	+0.00 -1.92	+0.00 -0.66
0.1 - 0.3	15843 $\pm 234$ $^{+875}_{-348}$	6713 $\pm 209$ $^{+248}_{-688}$	1083 $\pm 61$ $^{+101}_{-193}$	67.0 $\pm 0.9$ $^{+3.7}_{-1.5}$	28.4 $\pm 0.9$ $^{+1.0}_{-2.9}$	4.6 $\pm 0.3$ $^{+0.4}_{-0.8}$
LP2	+0 -348	+248 -0	+101 -0	+0.00 -1.48	+1.05 -0.00	+0.43 -0.00
LP4	+445 -0	+0 -346	+0 -107	+1.90 -0.00	+0.00 -1.45	+0.00 -0.45
LP5	+753 -0	+0 -595	+0 -161	+3.20 -0.00	+0.00 -2.52	+0.00 -0.68
0.3 - 0.5	15147 $\pm 226$ $^{+836}_{-371}$	6718 $\pm 195$ $^{+276}_{-665}$	899 $\pm 54$ $^{+97}_{-184}$	66.5 $\pm 0.9$ $^{+3.7}_{-1.6}$	29.5 $\pm 0.9$ $^{+1.2}_{-2.9}$	3.9 $\pm 0.3$ $^{+0.4}_{-0.8}$
LP2	+0 -371	+276 -0	+97 -0	+0.00 -1.63	+1.21 -0.00	+0.42 -0.00
LP4	+425 -0	+0 -339	+0 -98	+1.90 -0.00	+0.00 -1.47	+0.00 -0.43
LP5	+720 -0	+0 -572	+0 -155	+3.19 -0.00	+0.00 -2.50	+0.00 -0.68
0.5 - 0.6	14393 $\pm 210$ $^{+735}_{-482}$	6228 $\pm 187$ $^{+296}_{-602}$	780 $\pm 54$ $^{+83}_{-140}$	67.3 $\pm 0.9$ $^{+3.5}_{-1.8}$	29.1 $\pm 0.9$ $^{+1.4}_{-2.8}$	3.6 $\pm 0.3$ $^{+0.4}_{-0.7}$
LP2	+0 -382	+296 -0	+83 -0	+0.00 -1.78	+1.39 -0.00	+0.39 -0.00
LP4	+411 -0	+0 -337	+0 -79	+1.94 -0.00	+0.00 -1.57	+0.00 -0.37
LP5	+609 -0	+0 -499	+0 -116	+2.86 -0.00	+0.00 -2.33	+0.00 -0.54
0.6 - 0.8	13827 $\pm 223$ $^{+769}_{-395}$	6076 $\pm 207$ $^{+282}_{-605}$	983 $\pm 66$ $^{+109}_{-165}$	66.2 $\pm 1.1$ $^{+3.7}_{-1.9}$	29.1 $\pm 1.0$ $^{+1.4}_{-2.9}$	4.7 $\pm 0.4$ $^{+0.5}_{-0.8}$
LP2	+0 -395	+282 -0	+109 -0	+0.00 -1.88	+1.36 -0.00	+0.52 -0.00
LP4	+385 -0	+0 -283	+0 -102	+1.85 -0.00	+0.00 -1.36	+0.00 -0.49
LP5	+666 -0	+0 -534	+0 -130	+3.18 -0.00	+0.00 -2.56	+0.00 -0.62
0.8 - 0.9	13567 $\pm 223$ $^{+781}_{-388}$	6359 $\pm 202$ $^{+279}_{-679}$	826 $\pm 61$ $^{+106}_{-95}$	65.4 $\pm 1.0$ $^{+3.7}_{-1.9}$	30.6 $\pm 1.0$ $^{+1.3}_{-3.3}$	4.0 $\pm 0.3$ $^{+0.5}_{-0.5}$
LP2	+0 -388	+279 -0	+106 -0	+0.00 -1.86	+1.35 -0.00	+0.51 -0.00
LP4	+428 -0	+0 -363	+0 -58	+2.04 -0.00	+0.00 -1.76	+0.00 -0.28
LP5	+654 -0	+0 -573	+0 -75	+3.13 -0.00	+0.00 -2.77	+0.00 -0.36
0.9 - 1.2	27154 $\pm 305$ $^{+1418}_{-759}$	11828 $\pm 289$ $^{+617}_{-1282}$	1925 $\pm 95$ $^{+130}_{-151}$	66.4 $\pm 0.7$ $^{+3.5}_{-1.8}$	28.9 $\pm 0.7$ $^{+1.5}_{-3.1}$	4.7 $\pm 0.3$ $^{+0.3}_{-0.4}$
LP2	+0 -759	+617 -0	+130 -0	+0.00 -1.84	+1.52 -0.00	+0.32 -0.00
LP4	+809 -0	+0 -787	+0 -12	+1.96 -0.00	+0.00 -1.93	+0.00 -0.03
LP5	+1165 -0	+0 -1012	+0 -150	+2.84 -0.00	+0.00 -2.48	+0.00 -0.37
1.2 - 1.6	30589 $\pm 343$ $^{+1237}_{-655}$	13288 $\pm 333$ $^{+387}_{-1057}$	2225 $\pm 108$ $^{+268}_{-181}$	66.3 $\pm 0.8$ $^{+2.7}_{-1.4}$	28.8 $\pm 0.7$ $^{+0.8}_{-2.3}$	4.8 $\pm 0.3$ $^{+0.6}_{-0.4}$
LP2	+0 -655	+387 -0	+268 -0	+0.00 -1.42	+0.84 -0.00	+0.58 -0.00
LP4	+648 -0	+0 -600	+0 -32	+1.38 -0.00	+0.00 -1.31	+0.00 -0.07
LP5	+1054 -0	+0 -870	+0 -178	+2.28 -0.00	+0.00 -1.89	+0.00 -0.39
1.6 - 2.0	17663 $\pm 284$ $^{+228}_{-438}$	8417 $\pm 285$ $^{+443}_{-89}$	1058 $\pm 87$ $^{+34}_{-170}$	65.1 $\pm 1.1$ $^{+0.9}_{-1.6}$	31.0 $\pm 1.1$ $^{+1.6}_{-0.6}$	3.9 $\pm 0.4$ $^{+0.1}_{-0.4}$
LP2	+0 -417	+392 -0	+34 -0	+0.00 -1.56	+1.43 -0.00	+0.12 -0.00
LP4	+0 -135	+206 -0	+0 -76	+0.00 -0.48	+0.77 -0.00	+0.00 -0.28
LP5	+228 -0	+0 -89	+0 -151	+0.87 -0.00	+0.00 -0.31	+0.00 -0.56
2.0 - 2.5	5928 $\pm 149$ $^{+92}_{-85}$	2570 $\pm 133$ $^{+86}_{-87}$	175 $\pm 29$ $^{+16}_{-9}$	68.4 $\pm 1.6$ $^{+1.0}_{-3.0}$	29.6 $\pm 1.6$ $^{+1.0}_{-1.0}$	2.0 $\pm 0.4$ $^{+0.2}_{-0.0}$
LP2	+0 -82	+86 -0	+0 -0	+0.00 -0.98	+0.98 -0.00	+0.00 -0.00
LP4	+0 -21	+5 -0	+16 -0	+0.00 -0.25	+0.06 -0.00	+0.19 -0.00
LP5	+92 -0	+0 -87	+1 -0	+1.02 -0.00	+0.00 -1.03	+0.00 -0.00
$p_T^{\gamma\gamma}$ [GeV]						
-10 - 30	95582 $\pm 583$ $^{+3765}_{-1550}$	46751 $\pm 495$ $^{+596}_{-2449}$	8246 $\pm 161$ $^{+892}_{-1301}$	63.5 $\pm 0.4$ $^{+2.5}_{-1.0}$	31.0 $\pm 0.4$ $^{+0.4}_{-1.6}$	5.5 $\pm 0.1$ $^{+0.6}_{-0.9}$
LP2	+0 -1550	+566 -0	+892 -0	+0.00 -0.99	+0.39 -0.00	+0.60 -0.00
LP4	+1878 -0	+0 -1263	+0 -608	+1.24 -0.00	+0.00 -0.84	+0.00 -0.40
LP5	+3263 -0	+0 -2098	+0 -1150	+2.16 -0.00	+0.00 -1.40	+0.00 -0.76
30 - 60	44722 $\pm 378$ $^{+1645}_{-1036}$	17081 $\pm 343$ $^{+788}_{-1376}$	2217 $\pm 99$ $^{+235}_{-266}$	69.9 $\pm 0.6$ $^{+2.6}_{-1.6}$	26.7 $\pm 0.6$ $^{+1.2}_{-2.2}$	3.5 $\pm 0.2$ $^{+0.4}_{-0.4}$
LP2	+0 -1036	+788 -0	+235 -0	+0.00 -1.60	+1.24 -0.00	+0.37 -0.00
LP4	+817 -0	+0 -688	+0 -127	+1.27 -0.00	+0.00 -1.08	+0.00 -0.20
LP5	+1428 -0	+0 -1192	+0 -234	+2.23 -0.00	+0.00 -1.86	+0.00 -0.37
60 - 90	16730 $\pm 213$ $^{+615}_{-347}$	5237 $\pm 183$ $^{+272}_{-433}$	607 $\pm 51$ $^{+79}_{-89}$	74.1 $\pm 0.9$ $^{+2.3}_{-1.6}$	23.2 $\pm 0.8$ $^{+1.2}_{-1.9}$	2.7 $\pm 0.3$ $^{+0.4}_{-0.4}$
LP2	+0 -347	+272 -0	+79 -0	+0.00 -1.55	+1.20 -0.00	+0.35 -0.00
LP4	+275 -0	+0 -242	+0 -38	+1.23 -0.00	+0.00 -1.07	+0.00 -0.17
LP5	+436 -0	+0 -360	+0 -80	+1.95 -0.00	+0.00 -1.59	+0.00 -0.36
90 - 120	7128 $\pm 134$ $^{+194}_{-174}$	1956 $\pm 112$ $^{+170}_{-164}$	206 $\pm 31$ $^{+7}_{-32}$	76.7 $\pm 1.3$ $^{+2.1}_{-1.9}$	21.1 $\pm 1.3$ $^{+1.8}_{-1.8}$	2.2 $\pm 0.4$ $^{+0.1}_{-0.3}$
LP2	+0 -174	+170 -0	+7 -0	+0.00 -1.90	+1.82 -0.00	+0.08 -0.00
LP4	+99 -0	+0 -88	+0 -12	+1.08 -0.00	+0.00 -0.95	+0.00 -0.13
LP5	+167 -0	+0 -139	+0 -30	+1.81 -0.00	+0.00 -1.49	+0.00 -0.32
120 - 350	7388 $\pm 128$ $^{+109}_{-134}$	1840 $\pm 99$ $^{+122}_{-140}$	113 $\pm 24$ $^{+34}_{-9}$	79.1 $\pm 1.1$ $^{+1.2}_{-1.5}$	19.7 $\pm 1.1$ $^{+1.3}_{-1.5}$	1.2 $\pm 0.3$ $^{+0.4}_{-0.0}$
LP2	+0 -134	+122 -0	+17 -0	+0.00 -1.47	+1.30 -0.00	+0.18 -0.00
LP4	+0 -8	+0 -4	+9 -0	+0.00 -0.06	+0.00 -0.03	+0.10 -0.00
LP5	+109 -0	+0 -140	+28 -0	+1.19 -0.00	+0.00 -1.50	+0.30 -0.00
350 - 13000	332 $\pm 25$ $^{+14}_{-2}$	80 $\pm 16$ $^{+9}_{-11}$	2 $\pm 1$ $^{+4}_{-0}$	80.3 $\pm 4.4$ $^{+2.7}_{-0.5}$	19.2 $\pm 4.4$ $^{+0.0}_{-2.8}$	0.4 $\pm 0.2$ $^{+0.9}_{-0.1}$
LP2	+0 -2	+0 -2	+4 -0	+0.00 -0.46	+0.00 -0.43	+0.89 -0.00
LP4	+2 -0	+0 -1	+0 -0	+0.29 -0.00	+0.00 -0.23	+0.00 -0.06
LP5	+14 -0	+0 -11	+0 -0	+2.65 -0.00	+0.00 -2.76	+0.11 -0.00

Table 4: 2x2D Sideband Method: 13 TeV yields and purities : 140.0 fb<sup>-1</sup> for

	Yield $\pm$ stat. $\pm$ syst.			Fraction $\pm$ stat. $\pm$ syst. [%]		
	$\gamma\gamma$	$\gamma$ -jet	jet-jet	$\gamma\gamma$	$\gamma$ -jet	jet-jet
$\Delta\phi(j,j)$						
-5.0 - -3.1	141915 $\pm$ 726 $^{+6071}_{-3147}$	65675 $\pm$ 686 $^{+2243}_{-4760}$	10043 $\pm$ 214 $^{+904}_{-1358}$	65.2 $\pm$ 0.3 $^{+2.8}_{-1.4}$	30.2 $\pm$ 0.3 $^{+1.0}_{-2.2}$	4.6 $\pm$ 0.1 $^{+0.4}_{-0.6}$
LP2	+0 -3147	+2243 -0	+904 -0	+0.00 -1.45	+1.03 -0.00	+0.42 -0.00
LP4	+2983 -0	+0 -2366	+0 -646	+1.38 -0.00	+0.00 -1.08	+0.00 -0.30
LP5	+5288 -0	+0 -4130	+0 -1194	+2.44 -0.00	+0.00 -1.89	+0.00 -0.55
-3.1 - -1.6	10263 $\pm$ 166 $^{+276}_{-222}$	3177 $\pm$ 140 $^{+188}_{-231}$	305 $\pm$ 37 $^{+38}_{-45}$	74.7 $\pm$ 1.1 $^{+2.0}_{-1.6}$	23.1 $\pm$ 1.1 $^{+1.4}_{-1.7}$	2.2 $\pm$ 0.3 $^{+0.3}_{-0.3}$
LP2	+0 -222	+188 -0	+38 -0	+0.00 -1.63	+1.36 -0.00	+0.28 -0.00
LP4	+116 -0	+0 -86	+0 -29	+0.84 -0.00	+0.00 -0.63	+0.00 -0.21
LP5	+250 -0	+0 -214	+0 -35	+1.81 -0.00	+0.00 -1.56	+0.00 -0.25
-1.6 - 0.0	4297 $\pm$ 107 $^{+140}_{-92}$	1303 $\pm$ 91 $^{+80}_{-133}$	158 $\pm$ 26 $^{+15}_{-10}$	74.6 $\pm$ 1.7 $^{+2.4}_{-1.6}$	22.6 $\pm$ 1.7 $^{+1.4}_{-2.3}$	2.7 $\pm$ 0.5 $^{+0.3}_{-0.2}$
LP2	+0 -92	+80 -0	+14 -0	+0.00 -1.62	+1.38 -0.00	+0.24 -0.00
LP4	+72 -0	+0 -77	+7 -0	+1.22 -0.00	+0.00 -1.34	+0.11 -0.00
LP5	+120 -0	+0 -108	+0 -10	+2.06 -0.00	+0.00 -1.89	+0.00 -0.17
0.0 - 1.6	4089 $\pm$ 107 $^{+74}_{-119}$	1457 $\pm$ 93 $^{+118}_{-73}$	137 $\pm$ 25 $^{+3}_{-4}$	71.9 $\pm$ 1.7 $^{+1.3}_{-2.1}$	25.6 $\pm$ 1.7 $^{+2.1}_{-1.3}$	2.4 $\pm$ 0.5 $^{+0.1}_{-0.1}$
LP2	+0 -119	+118 -0	+3 -0	+0.00 -2.11	+2.06 -0.00	+0.05 -0.00
LP4	+0 -5	+6 -0	+0 -3	+0.00 -0.07	+0.11 -0.00	+0.00 -0.04
LP5	+74 -0	+0 -73	+0 -3	+1.32 -0.00	+0.00 -1.27	+0.00 -0.05
1.6 - 3.1	10330 $\pm$ 163 $^{+364}_{-210}$	2909 $\pm$ 137 $^{+165}_{-369}$	318 $\pm$ 37 $^{+43}_{-8}$	76.2 $\pm$ 1.1 $^{+2.7}_{-1.5}$	21.5 $\pm$ 1.1 $^{+1.2}_{-2.7}$	2.3 $\pm$ 0.3 $^{+0.3}_{-0.1}$
LP2	+0 -210	+165 -0	+43 -0	+0.00 -1.54	+1.22 -0.00	+0.32 -0.00
LP4	+191 -0	+0 -201	+4 -0	+1.44 -0.00	+0.00 -1.47	+0.03 -0.00
LP5	+310 -0	+0 -309	+0 -8	+2.33 -0.00	+0.00 -2.27	+0.00 -0.06
$m_{jj}$ [GeV]						
-100 - 0	141915 $\pm$ 733 $^{+6071}_{-3147}$	65675 $\pm$ 688 $^{+2243}_{-4760}$	10043 $\pm$ 209 $^{+904}_{-1358}$	65.2 $\pm$ 0.3 $^{+2.8}_{-1.4}$	30.2 $\pm$ 0.3 $^{+1.0}_{-2.2}$	4.6 $\pm$ 0.1 $^{+0.4}_{-0.6}$
LP2	+0 -3147	+2243 -0	+904 -0	+0.00 -1.45	+1.03 -0.00	+0.42 -0.00
LP4	+2983 -0	+0 -2366	+0 -646	+1.38 -0.00	+0.00 -1.08	+0.00 -0.30
LP5	+5288 -0	+0 -4130	+0 -1194	+2.44 -0.00	+0.00 -1.89	+0.00 -0.55
0 - 120	9288 $\pm$ 164 $^{+310}_{-149}$	3333 $\pm$ 142 $^{+212}_{-326}$	299 $\pm$ 37 $^{+42}_{-0}$	71.9 $\pm$ 1.2 $^{+2.4}_{-1.9}$	25.8 $\pm$ 1.2 $^{+1.6}_{-2.5}$	2.3 $\pm$ 0.3 $^{+0.3}_{-0.0}$
LP2	+0 -249	+212 -0	+40 -0	+0.00 -1.94	+1.64 -0.00	+0.31 -0.00
LP4	+144 -0	+0 -160	+12 -0	+1.14 -0.00	+0.00 -1.23	+0.10 -0.00
LP5	+274 -0	+0 -283	+4 -0	+2.15 -0.00	+0.00 -2.18	+0.03 -0.00
120 - 450	15883 $\pm$ 201 $^{+402}_{-312}$	4534 $\pm$ 167 $^{+260}_{-460}$	444 $\pm$ 44 $^{+53}_{-34}$	76.1 $\pm$ 0.9 $^{+2.4}_{-1.5}$	21.7 $\pm$ 0.8 $^{+1.2}_{-2.2}$	2.1 $\pm$ 0.2 $^{+0.3}_{-0.2}$
LP2	+0 -312	+260 -0	+53 -0	+0.00 -1.50	+1.24 -0.00	+0.25 -0.00
LP4	+223 -0	+0 -206	+0 -17	+1.07 -0.00	+0.00 -0.99	+0.00 -0.08
LP5	+439 -0	+0 -411	+0 -29	+2.11 -0.00	+0.00 -1.97	+0.00 -0.14
450 - 1500	3556 $\pm$ 95 $^{+65}_{-74}$	889 $\pm$ 81 $^{+66}_{-27}$	169 $\pm$ 26 $^{+11}_{-36}$	77.1 $\pm$ 1.9 $^{+1.4}_{-1.6}$	19.3 $\pm$ 1.8 $^{+1.4}_{-0.6}$	3.7 $\pm$ 0.6 $^{+0.2}_{-0.8}$
LP2	+0 -74	+66 -0	+11 -0	+0.00 -1.64	+1.41 -0.00	+0.23 -0.00
LP4	+24 -0	+0 -10	+0 -14	+0.52 -0.00	+0.00 -0.21	+0.00 -0.31
LP5	+60 -0	+0 -25	+0 -33	+1.27 -0.00	+0.00 -0.55	+0.00 -0.72
1500 - 13000	250 $\pm$ 26 $^{+3}_{-10}$	94 $\pm$ 21 $^{+10}_{-3}$	3 $\pm$ 4 $^{+0}_{-1}$	71.9 $\pm$ 6.7 $^{+1.1}_{-3.0}$	27.2 $\pm$ 6.6 $^{+3.0}_{-0.9}$	0.9 $\pm$ 1.3 $^{+0.0}_{-0.4}$
LP2	+0 -10	+10 -0	+0 -0	+0.00 -2.97	+3.03 -0.00	+0.00 -0.05
LP4	+0 -1	+1 -0	+0 -1	+0.01 -0.00	+0.27 -0.00	+0.00 -0.28
LP5	+3 -0	+0 -3	+0 -1	+1.13 -0.00	+0.00 -0.89	+0.00 -0.24
$N_{b-\text{tagged jets}}(30\text{GeV})$						
$N_{jets} = 0$	95583 $\pm$ 566 $^{+3764}_{-1551}$	46751 $\pm$ 466 $^{+566}_{-2449}$	8246 $\pm$ 159 $^{+892}_{-1301}$	63.5 $\pm$ 0.3 $^{+2.5}_{-1.0}$	31.0 $\pm$ 0.3 $^{+0.4}_{-1.6}$	5.5 $\pm$ 0.1 $^{+0.6}_{-0.9}$
LP2	+0 -1551	+566 -0	+892 -0	+0.00 -0.99	+0.40 -0.00	+0.60 -0.00
LP4	+1878 -0	+0 -1263	+0 -608	+1.24 -0.00	+0.00 -0.84	+0.00 -0.40
LP5	+3262 -0	+0 -2098	+0 -1150	+2.16 -0.00	+0.00 -1.40	+0.00 -0.76
$N_{jets} = 1$	71932 $\pm$ 461 $^{+2369}_{-1597}$	24991 $\pm$ 410 $^{+1257}_{-1982}$	3035 $\pm$ 108 $^{+346}_{-406}$	72.0 $\pm$ 0.4 $^{+2.4}_{-1.6}$	25.0 $\pm$ 0.4 $^{+1.3}_{-2.0}$	3.0 $\pm$ 0.1 $^{+0.3}_{-0.4}$
LP2	+0 -1597	+1257 -0	+346 -0	+0.00 -1.60	+1.26 -0.00	+0.35 -0.00
LP4	+1121 -0	+0 -926	+0 -206	+1.13 -0.00	+0.00 -0.92	+0.00 -0.21
LP5	+2086 -0	+0 -1753	+0 -350	+2.10 -0.00	+0.00 -1.75	+0.00 -0.35
$N_{jets} = 2$	4137 $\pm$ 99 $^{+143}_{-103}$	1091 $\pm$ 78 $^{+89}_{-149}$	73 $\pm$ 18 $^{+20}_{-3}$	78.0 $\pm$ 1.6 $^{+2.8}_{-2.0}$	20.6 $\pm$ 1.6 $^{+1.7}_{-2.8}$	1.4 $\pm$ 0.4 $^{+0.4}_{-0.1}$
LP2	+0 -103	+89 -0	+18 -0	+0.00 -2.00	+1.66 -0.00	+0.35 -0.00
LP4	+77 -0	+0 -87	+7 -0	+1.49 -0.00	+0.00 -1.63	+0.14 -0.00
LP5	+121 -0	+0 -121	+0 -3	+2.33 -0.00	+0.00 -2.28	+0.00 -0.05
$N_{jets} \geq 3$	275 $\pm$ 30 $^{+11}_{-10}$	96 $\pm$ 28 $^{+9}_{-8}$	13 $\pm$ 8 $^{+0}_{-4}$	71.6 $\pm$ 7.7 $^{+2.9}_{-2.3}$	25.1 $\pm$ 7.6 $^{+2.5}_{-2.0}$	3.3 $\pm$ 2.5 $^{+0.0}_{-0.9}$
LP2	+0 -10	+9 -0	+0 -0	+0.00 -2.34	+2.46 -0.00	+0.00 -0.11
LP4	+3 -0	+0 -4	+0 -0	+0.94 -0.00	+0.00 -0.93	+0.00 -0.01
LP5	+10 -0	+0 -7	+0 -4	+2.71 -0.00	+0.00 -1.80	+0.00 -0.91

Table 5: 2x2D Sideband Method: 13 TeV yields and purities : 140.0 fb<sup>-1</sup> for

	Yield $\pm$ stat. $\pm$ syst.			Fraction $\pm$ stat. $\pm$ syst. [%]		
	$\gamma\gamma$	$\gamma$ -jet	jet-jet	$\gamma\gamma$	$\gamma$ -jet	jet-jet
$N_{leptons}(15GeV)$						
-0.5 - 0.5	$170576 \pm 778^{+6994}_{-3808}$	$74414 \pm 723^{+2776}_{-5584}$	$10971 \pm 213^{+1046}_{-1480}$	$66.6 \pm 0.3^{+2.8}_{-1.5}$	$29.1 \pm 0.3^{+1.1}_{-2.2}$	$4.3 \pm 0.1^{+0.4}_{-0.6}$
LP2	+0 -3808	+2776 -0	+1046 -0	+0.00 -1.49	+1.08 -0.00	+0.41 -0.00
LP4	+3400 -0	+0 -2745	+0 -695	+1.34 -0.00	+0.00 -1.07	+0.00 -0.27
LP5	+6113 -0	+0 -4863	+0 -1307	+2.40 -0.00	+0.00 -1.89	+0.00 -0.51
0.5 - 10.0	$346 \pm 32^{+20}_{-9}$	$77 \pm 30^{+3}_{-13}$	$13 \pm 10^{+5}_{-6}$	$79.3 \pm 7.3^{+4.4}_{-1.9}$	$17.7 \pm 7.0^{+0.8}_{-3.1}$	$3.0 \pm 2.5^{+1.2}_{-1.4}$
LP2	+0 -9	+3 -0	+5 -0	+0.00 -1.95	+0.76 -0.00	+1.19 -0.00
LP4	+10 -0	+0 -5	+0 -5	+2.29 -0.00	+0.00 -1.13	+0.00 -1.16
LP5	+17 -0	+0 -12	+0 -4	+3.70 -0.00	+0.00 -2.84	+0.00 -0.86

Table 6: 2x2D Sideband Method: 13 TeV yields and purities : 140.0 fb<sup>-1</sup> for