

**Supplemental table S1.**

Quantification of *C. albicans* wall proteins relative to a <sup>15</sup>N reference culture expressed as protein <sup>14</sup>N/<sup>15</sup>N isotopic ratio

Protein	pH 7.4 37°C					pH 7.4 42°C					42°/37°
	R1	R2	R3	AV	SD	R1	R2	R3	AV	SD	
<b>Als1</b>	0.80	0.80	0.90	<b>0.83</b>	<b>0.06</b>	5.44	6.61	5.10	<b>5.72</b>	<b>0.79</b>	<b>6.86</b>
<b>Als2</b>	0.08	0.09	0.14	<b>0.10</b>	<b>0.03</b>	0.03	0.02	nd	<b>0.03</b>	<b>0.01</b>	<b>0.24</b>
<b>Als3</b>	0.49	0.49	0.69	<b>0.56</b>	<b>0.12</b>	1.29	1.93	1.06	<b>1.43</b>	<b>0.45</b>	<b>2.56</b>
<b>Als4</b>	0.06	0.07	0.09	<b>0.07</b>	<b>0.02</b>	0.04	0.13	0.06	<b>0.08</b>	<b>0.05</b>	<b>1.05</b>
<b>Cht2</b>	0.49	0.57	0.66	<b>0.57</b>	<b>0.09</b>	0.21	0.37	0.22	<b>0.27</b>	<b>0.09</b>	<b>0.47</b>
<b>Crh11</b>	0.99	1.01	1.27	<b>1.09</b>	<b>0.16</b>	4.15	4.53	3.44	<b>4.04</b>	<b>0.55</b>	<b>3.71</b>
<b>Csa1</b>	1.15	1.27	1.46	<b>1.29</b>	<b>0.16</b>	0.13	0.01	0.02	<b>0.05</b>	<b>0.07</b>	<b>0.04</b>
<b>Ecm33</b>	0.66	0.69	0.84	<b>0.73</b>	<b>0.10</b>	5.16	5.47	3.65	<b>4.76</b>	<b>0.97</b>	<b>6.52</b>
<b>Mp65</b>	1.02	1.01	1.26	<b>1.10</b>	<b>0.14</b>	1.59	1.59	1.70	<b>1.63</b>	<b>0.06</b>	<b>1.48</b>
<b>Pga4</b>	1.08	1.22	1.35	<b>1.22</b>	<b>0.14</b>	2.39	2.06	1.66	<b>2.04</b>	<b>0.37</b>	<b>1.67</b>
<b>Pga10</b>	1.14	1.55	nd	<b>1.35</b>	<b>0.29</b>	nd	0.40	nd	<b>0.40</b>		<b>0.30</b>
<b>Phr1</b>	1.86	1.86	2.35	<b>2.02</b>	<b>0.28</b>	6.89	7.69	5.05	<b>6.54</b>	<b>1.35</b>	<b>3.23</b>
<b>Phr2</b>	0.45	0.37	0.36	<b>0.39</b>	<b>0.05</b>	4.51	8.93	4.59	<b>6.01</b>	<b>2.53</b>	<b>15.28</b>
<b>Pir1</b>	0.05	0.06	0.07	<b>0.06</b>	<b>0.01</b>	0.28	0.48	nd	<b>0.38</b>	<b>0.14</b>	<b>6.33</b>
<b>Rbt1</b>	0.45	0.59	0.45	<b>0.50</b>	<b>0.08</b>	0.42	0.44	nd	<b>0.43</b>	<b>0.01</b>	<b>0.87</b>
<b>Rbt5</b>	1.47	1.78	1.65	<b>1.63</b>	<b>0.16</b>	0.56	0.11	0.17	<b>0.28</b>	<b>0.24</b>	<b>0.17</b>
<b>Rhd3</b>	0.32	0.35	0.42	<b>0.36</b>	<b>0.05</b>	0.07	0.12	0.07	<b>0.09</b>	<b>0.03</b>	<b>0.24</b>
<b>Sap9</b>	2.40	2.30	2.50	<b>2.40</b>	<b>0.10</b>	3.44	4.99	3.40	<b>3.94</b>	<b>0.91</b>	<b>1.64</b>
<b>Sod4</b>	1.96	2.18	2.29	<b>2.14</b>	<b>0.17</b>	0.74	0.28	0.34	<b>0.45</b>	<b>0.25</b>	<b>0.21</b>
<b>Sod5</b>	0.89	0.93	1.02	<b>0.95</b>	<b>0.07</b>	1.69	1.73	nd	<b>1.71</b>	<b>0.03</b>	<b>1.81</b>
<b>Ssr1</b>	1.34	1.31	1.49	<b>1.38</b>	<b>0.10</b>	1.83	1.35	1.17	<b>1.45</b>	<b>0.34</b>	<b>1.05</b>
<b>Tos1</b>	0.90	0.95	0.95	<b>0.93</b>	<b>0.03</b>	3.07	3.03	2.90	<b>3.00</b>	<b>0.09</b>	<b>3.21</b>
<b>Utr2</b>	1.53	1.49	1.76	<b>1.59</b>	<b>0.15</b>	6.48	7.12	nd	<b>6.80</b>	<b>0.45</b>	<b>4.27</b>
<b>Ywp1</b>	1.71	1.78	1.53	<b>1.67</b>	<b>0.13</b>	0.49	0.44	nd	<b>0.47</b>	<b>0.04</b>	<b>0.28</b>

R = replicate, AV = average, SD = standard deviation, nd = not detected

Numbers for each replicate represent <sup>14</sup>N/<sup>15</sup>N protein ratios, derived from peptide ratios of query and reference culture

**Supplemental table S2.**

Quantification of *C. albicans* wall proteins relative to a <sup>15</sup>N reference culture expressed as protein <sup>14</sup>N/<sup>15</sup>N isotopic ratio

Protein	pH 4 37°C						pH 4 42°C						42°/37°
	R1	R2	R3	R4	AV	SD	R1	R2	R3	R4	AV	SD	
<b>Als1</b>	0.25	0.25	nd	0.15	<b>0.22</b>	<b>0.06</b>	0.30	0.35	0.40	nd	<b>0.35</b>	<b>0.05</b>	<b>1.62</b>
<b>Als2</b>	0.05	0.06	0.06	0.05	<b>0.06</b>	<b>0.01</b>	<0.01	0.01	0.01	0.01	<b>0.01</b>	<b>0.00</b>	<b>0.18</b>
<b>Als3</b>	0.04	0.03	0.01	0.01	<b>0.02</b>	<b>0.02</b>	0.01	0.01	0.07	0.05	<b>0.04</b>	<b>0.03</b>	<b>1.56</b>
<b>Als4</b>	0.21	0.16	0.26	0.26	<b>0.22</b>	<b>0.05</b>	0.01	0.02	0.01	0.03	<b>0.02</b>	<b>0.01</b>	<b>0.08</b>
<b>Cht2</b>	0.46	0.51	0.67	0.51	<b>0.54</b>	<b>0.09</b>	0.06	0.06	0.09	0.09	<b>0.08</b>	<b>0.02</b>	<b>0.14</b>
<b>Crh11</b>	0.49	0.54	0.56	0.48	<b>0.52</b>	<b>0.04</b>	0.91	0.96	1.39	1.41	<b>1.17</b>	<b>0.27</b>	<b>2.26</b>
<b>Csa1</b>	<0.01	<0.01	0.01	0.01	<b>0.01</b>	<b>0.00</b>	<0.01	<0.01	0.01	0.01	<b>0.01</b>	<b>0.00</b>	<b>1.00</b>
<b>Ecm33</b>	1.43	1.82	1.49	1.25	<b>1.50</b>	<b>0.24</b>	4.85	4.77	6.61	6.41	<b>5.66</b>	<b>0.99</b>	<b>3.78</b>
<b>Mp65</b>	1.37	1.53	1.48	1.19	<b>1.39</b>	<b>0.15</b>	1.44	1.39	1.63	1.84	<b>1.58</b>	<b>0.20</b>	<b>1.13</b>
<b>Pga4</b>	1.31	1.54	1.48	1.25	<b>1.40</b>	<b>0.14</b>	1.68	1.59	1.95	2.07	<b>1.82</b>	<b>0.23</b>	<b>1.31</b>
<b>Pga10</b>	0.01	nd	0.44	0.40	<b>0.28</b>	<b>0.24</b>	nd	nd	0.01	0.01	<b>0.01</b>	<b>0.00</b>	<b>0.04</b>
<b>Phr1</b>	0.01	nd	nd	0.02	<b>0.02</b>	<b>0.01</b>	0.02	0.02	0.02	0.02	<b>0.02</b>	<b>0.00</b>	<b>1.33</b>
<b>Phr2</b>	2.29	2.20	2.10	2.18	<b>2.19</b>	<b>0.08</b>	9.06	10.14	13.14	12.31	<b>11.16</b>	<b>1.89</b>	<b>5.09</b>
<b>Pir1</b>	1.01	1.22	1.38	1.28	<b>1.22</b>	<b>0.16</b>	1.11	1.16	1.44	1.37	<b>1.27</b>	<b>0.16</b>	<b>1.04</b>
<b>Rbt1</b>	0.04	0.01	0.01	0.01	<b>0.02</b>	<b>0.02</b>	0.01	0.01	0.05	nd	<b>0.02</b>	<b>0.02</b>	<b>1.33</b>
<b>Rbt5</b>	0.59	0.64	0.56	0.49	<b>0.57</b>	<b>0.06</b>	<0.01	0.02	0.01	0.01	<b>0.01</b>	<b>0.01</b>	<b>0.02</b>
<b>Rhd3</b>	0.76	0.86	0.96	0.84	<b>0.86</b>	<b>0.08</b>	0.12	0.09	0.13	0.13	<b>0.12</b>	<b>0.02</b>	<b>0.14</b>
<b>Sap9</b>	0.60	0.60	nd	0.60	<b>0.60</b>	<b>0.00</b>	1.20	1.30	1.50	nd	<b>1.33</b>	<b>0.15</b>	<b>2.22</b>
<b>Sod4</b>	0.03	0.07	0.12	0.13	<b>0.09</b>	<b>0.05</b>	0.16	0.18	0.23	0.25	<b>0.21</b>	<b>0.04</b>	<b>2.34</b>
<b>Sod5</b>	nd	nd	nd	nd			nd	nd	nd	nd			
<b>Ssr1</b>	0.75	0.09	0.89	0.73	<b>0.62</b>	<b>0.36</b>	0.88	0.84	1.05	1.01	<b>0.95</b>	<b>0.10</b>	<b>1.54</b>
<b>Tos1</b>	0.90	0.90	nd	0.90	<b>0.90</b>	<b>0.00</b>	2.50	2.50	2.30	nd	<b>2.43</b>	<b>0.12</b>	<b>2.70</b>
<b>Utr2</b>	1.03	1.23	nd	0.89	<b>1.05</b>	<b>0.17</b>	2.94	3.04	4.19	4.16	<b>3.58</b>	<b>0.69</b>	<b>3.41</b>
<b>Ywp1</b>	0.33	nd	0.56	0.41	<b>0.43</b>	<b>0.12</b>	0.77	0.94	0.61	0.81	<b>0.78</b>	<b>0.14</b>	<b>1.81</b>

R = replicate, AV = average, SD = standard deviation, nd = not detected

Numbers for each replicate represent <sup>14</sup>N/<sup>15</sup>N protein ratios, derived from peptide ratios of query and reference culture

**Supplemental table S3.**

Secretory Proteins identified by Q-TOF in the growth medium of pH 7.4-grown cells  
(4 biological independent replicates each)

<b>Protein</b>	<b>25°C AV</b>	<b>SE</b>	<b>30°C AV</b>	<b>SE</b>	<b>37°C AV</b>	<b>SE</b>
<b>non-GPI proteins</b>						
Bgl2	2.6	0.44	5.0	0.61	4.1	0.78
Cht1	3.3	0.26	2.5	0.52	nd	
Cht3	5.7	0.40	8.4	0.54	5.2	0.57
Coi1	6.1	0.30	5.6	0.56	7.2	0.47
Cyp5	nd		0.5	0.28	nd	
Dag7	4.1	0.49	0.7	0.44	1.3	1.03
Eng1	3.5	0.76	6.9	0.89	4.3	1.77
Mp65	12.9	0.75	11.8	1.04	9.1	2.29
Msb2	nd		0.3	0.27	3.0	0.71
Op4	nd		0.3	0.26	nd	
Pir1	3.1	0.26	1.1	0.62	3.0	0.50
Plb4.5	1.7	0.70	1.0	0.37	nd	
Pra1	nd		0.7	0.44	nd	
Rbe1	3.3	0.93	1.7	0.41	3.2	1.31
Rbt4	0.9	0.34	0.5	0.28	0.9	0.69
Sap7	0.2	0.21	0.5	0.28	nd	
Scw11	9.9	0.49	7.3	0.65	8.0	0.35
Sim1	9.0	0.48	8.1	0.72	8.7	0.84
Sun41	7.2	0.28	7.9	0.63	5.4	0.78
Tos1	8.3	0.41	9.2	0.86	9.3	1.35
Xog1	7.1	1.05	7.3	1.07	11.1	1.05
<b>GPI-proteins</b>						
Als1	0.6	0.40	nd		nd	
Als2	nd		1.2	0.18	nd	
Als3	nd		nd		0.5	0.26
Als4	0.6	0.22	nd		nd	
Cht2	1.7	0.33	4.7	1.20	2.1	0.79
Ecm33	1.3	0.25	nd		0.4	0.42
Pga4	0.2	0.21	nd		0.5	0.26
Pga45	nd		nd		0.3	0.27
Rbt5	1.5	0.21	1.5	0.50	0.9	0.53
Rhd3	0.7	0.22	nd		nd	
Sod4	1.1	0.41	nd		0.5	0.54
Ssr1	1.3	0.26	nd		nd	
Utr2	nd		nd		0.4	0.42
Ywp1	1.8	0.04	1.7	0.47	5.8	1.09

AV = average % protein identification from all biological replicates of one condition

SE = standard error

nd = not detected

**Supplemental table S4.**

Secretory proteins identified by Q-TOF in the growth medium of pH 4-grown cells  
(4 biological independent replicates each)

<b>Protein</b>	<b>25°C AV</b>	<b>SE</b>	<b>30°C AV</b>	<b>SE</b>	<b>37°C AV</b>	<b>SE</b>	<b>42°C AV</b>	<b>SE</b>
<b>non-GPI proteins</b>								
Atc1	0.3	0.31	nd		nd		nd	
Bgl2	2.2	0.29	5.0	0.88	4.1	0.31	0.4	0.37
Cht1	nd		2.1	0.44	0.4	0.25	nd	
Cht3	10.7	0.34	8.6	0.18	7.0	0.75	3.3	0.68
Coi1	nd		nd		1.7	0.05	nd	
Dag7	7.9	0.66	3.8	0.10	3.1	0.31	9.5	0.19
Eng1	nd		4.3	0.38	6.3	0.38	nd	
Gca1	5.0	0.76	1.2	0.47	2.0	0.67	0.8	0.36
Mp65	7.8	0.85	11.5	0.45	8.9	1.15	8.7	0.77
Msb2	1.6	0.61	0.7	0.48	2.1	0.73	4.2	1.30
Nup	nd		0.2	0.23	0.2	0.22	nd	
orf19.1239	nd		0.2	0.24	nd		nd	
orf19.3499	nd		nd		nd		0.4	0.35
Pir1	1.9	0.39	1.7	0.26	2.1	0.35	nd	
Plb4.5	nd		4.8	1.02	5.5	1.42	nd	
Rbe1	6.3	0.95	1.7	0.43	1.5	0.77	2.0	0.93
Rbt4	3.8	0.52	nd		0.9		0.8	0.70
Sap2	7.5	0.43	nd		nd		nd	
Sap3	0.3	0.33	nd		nd		nd	
Sap7	nd		0.5	0.48	nd		nd	
Sap99	nd		nd		nd		0.4	0.35
Scw11	0.3	0.30	8.6	0.31	6.5	0.40	4.6	0.67
Sim1	9.8	1.50	5.0	0.37	4.7	0.60	7.1	1.68
Sun41	12.5	1.11	10.0	1.14	9.1	0.75	8.3	1.56
Tos1	11.2	1.99	7.6	0.52	5.6	0.89	10.3	1.43
Xog1	3.5	0.33	4.5	0.16	6.1	0.69	5.8	0.42
<b>GPI-proteins</b>								
Als2	nd		0.2	0.23	nd		nd	
Als4	nd		0.5	0.27	nd		nd	
Cht2	5.0	0.78	5.6	0.96	2.0	0.24	nd	
Ecm33	1.5	0.92	nd		2.6	0.64	11.6	0.84
Pga4	nd		3.1	0.48	4.1	0.23	1.7	0.40
Phr2	nd		0.2	0.24	nd		2.4	1.22
Rbt5	nd		1.9	0.05	1.1	0.23	nd	
Rhd3	0.6	0.36	1.0	0.42	1.5	0.43	nd	
Sap10	nd		0.9	0.64	0.5	0.46	1.7	0.34
Sod4	nd		nd		nd		0.4	0.35
Ssr1	nd		0.7	0.45	nd		0.8	0.70
Utr2	0.3	0.30	0.7	0.71	5.9	0.29	8.7	0.63
Ywp1	nd		2.8	0.32	3.1	0.45	2.5	1.61

AV = average % protein identification from all biological replicates of one condition

SE = standard error

nd = not detected