

Es 1 cemento 5pt					
q	kCal/kg	300	V	m3	0.3
	kJ/kg	1255.2	Q'	W/m2	130.8
tempo	giorni	30	h		15.0
q'	W/kg	0.484	deltaT_aria		8.7
ro_cemento		1800	lambda_legno		0.12
lambda_cemento		1.2	spessore legno		0.03
Cp cemento		880	delta_T_legno		32.7
q'	W/m3	871.7	delta_T cemento		8.17
semi-spessorse		0.150	q_aTmax	kJ/kg	44
A	m2	1	q_30gg	kJ/kg	1255.2

Es 2 irraggiamento					
	forno	pietra			
area	1.26	0.1413	F12		1.000
T	240	20	Q'		392.7471
	5.13	2.93			
eps	0.9	0.8			

Es 3 Q, L						
Mm	29		1	2	3	4
R	286.69	v	1	1	0.33	?
Cp	1003.41	P bar	1	1.587	7.39	1.00
Cv	716.72	T °C	25	200	461	142
<b>m [kg]</b>	<b>1.0000</b>	T K	298	473	734	415
	1.16	w [m/s]	0	0	0	801
	1.2	deltaU J	125426.7		187081.5	
		deltaH J	175597.4			
		Lin [J]	0.0		187081.5	
		Qin [J]	125426.7			

Es 4 Rankine										
			T °C	P kPa	x	h	s		ideale	reale
Tmin °C	40	1=LiqSat	40	7.384	0	167.6	0.5725	Qin	3253.78	3253.78
Pmax bar	160	2	40	16000	nd (<0)	<b>183.6</b>	"	L_nu_Tid	1404.00	1406.40
Tmax °C	550	2re				183.6		<b>eta1</b>	<b>43.1%</b>	<b>43.2%</b>
etaPpompa	1	5	550	16000	nd (>1)	3437.4	6.4787	etaC	62.0%	62.0%
etaTurb	1	6	40	7.384	<b>0.769</b>	<b>2017.3</b>	6.4787	<b>eta2</b>	<b>69.6%</b>	<b>69.8%</b>
		6re			<b>0.769</b>	2017.3				
		VapSat	40	7.384	1	2574.3	8.257			

Es 5 Ciclo Otto										
				P bar	T °C	T K				
P1 rel	-0.4	R	286.7	1	0.6	60	333	eta1		0.62
rapp_comp	11	Cv	716.7241	2	17.2	596	<b>869</b>	<b>etaC</b>		<b>0.88</b>
Q kJ/kg	1400	Cp	1003.4	3	55.9	2549	2822	<b>eta2</b>		<b>0.70</b>
		gamma	1.4	4	1.95	809	<b>1082</b>			

Es 6 condizionatore				
		K	°C	
Q'inf W	12000	Tsup	329	56
<b>COPid</b>	<b>5.58</b>	deltaTcond		22
<b>COPre</b>	<b>3.35</b>	T esterno		34
<b>Lin W</b>	<b>3584</b>	deltaT	50	

<b>Q'sup W</b>	<b>15584</b>	T locali		<b>23</b>
euro/kWh	<b>0.20</b>	deltaTevap		<b>17</b>
<b>Costo 12h</b>	<b>8.60</b>	Tinf	279	<b>6</b>

**Es 7** aria umida evapora

	1	delta 12	2	evapora	3
T °C	5		<b>50.0</b>	15.0	<b>39.2</b>
UR	80%				20%
Psat	<b>872.1</b>				<b>7090.6</b>
Pvap	697.7		697.7		1395
x	0.0043		0.0043	0.0044	0.0087
h kJ/kg_as	15.9	45.6	<b>61.4</b>	0.3	61.7

**Es 8** NTU+Moody

L1 m	0.2	T °C	12	w	<b>3</b>	<b>L m</b>	<b>34.56</b>	
L2 m	0.4	ro kg/m3	1.240	h		<b>5</b>	Re	55.1
P m	1.2	Cp	1005	m'		0.2976	ro w^2/2	5.6
Area m2	0.08	mi	0.018	Q' W		1795	lambda	1.161
Diam m	<b>0.267</b>	Tamb °C	<b>24</b>	NTUreq		0.693	deltaP Pa	840