

# Translations: Dimensionner une installation photovoltaïque autonome/294/en

type error or empty user value, continuing with batterie0= puissance0=2kWc with user input data and

a battery of 75.0kWh  
and a peak power of 2.0kWc,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 22.5kWh  
and a peak power of 2.66kWc,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 17.5kWh  
and a peak power of 3.320000000000003kWc,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 15.0kWh  
and a peak power of 3.98kWc,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 12.5kWh  
and a peak power of 4.64000000000001kWc,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 12.5kWh  
and a peak power of 5.300000000000001kWc,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 10.0kWh  
and a peak power of 5.96kWc,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 10.0kWh  
and a peak power of 6.62kWc,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 10.0kWh  
and a peak power of 7.28kWc,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 10.0kWh  
and a peak power of 7.94kWc,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 10.0kWh  
and a peak power of 8.600000000000001kWc,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 10.0kWh  
and a peak power of 9.26000000000002kWh,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 10.0kWh  
and a peak power of 9.92kWh,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 10.0kWh  
and a peak power of 10.58kWh,  
and an hypothesis of 0j without electricity as acceptable  
et 0 blackout episodes (or with an power generator)  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[]  
for a mean duration of electricityless episodes of 0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 2.0kWh,  
and an hypothesis of 10j without electricity as acceptable  
et 185 blackout episodes (or with an power generator):  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[[['14-01-2005', 1], ['19-01-2005', 3], ['23-01-2005', 2], ['01-02-2005', 1], ['11-02-2005', 3], ['17-11-2005', 1], ['26-11-2005', 3], ['02-12-2005', 1], ['04-12-2005', 2], ['07-12-2005', 2], ['12-12-2005', 6], ['22-12-2005', 2], ['25-12-2005', 3], ['31-12-2005', 2], ['03-01-2006', 10], ['18-01-2006', 4], ['29-01-2006', 7], ['23-02-2006', 1], ['09-03-2006', 2], ['21-11-2006', 2], ['25-11-2006', 2], ['28-11-2006', 1], ['30-11-2006', 5], ['08-12-2006', 3], ['20-12-2006', 7], ['08-01-2007', 1], ['20-01-2007', 4], ['30-01-2007', 4], ['06-02-2007', 3], ['08-10-2007', 1], ['10-10-2007', 1], ['01-12-2007', 1], ['07-12-2007', 3], ['15-12-2007', 1], ['25-12-2007', 5], ['01-01-2008', 3], ['05-01-2008', 5], ['11-01-2008', 1], ['18-01-2008', 2], ['22-01-2008', 2], ['30-01-2008', 1], ['01-02-2008', 1], ['07-03-2008', 1], ['11-03-2008', 2], ['17-05-2008', 2], ['28-10-2008', 1], ['30-10-2008', 2], ['02-11-2008', 2], ['06-11-2008', 2], ['15-11-2008', 9], ['30-11-2008', 2], ['03-12-2008', 2], ['12-12-2008', 9], ['25-12-2008', 2], ['04-01-2009', 9], ['14-01-2009', 1], ['23-01-2009', 2], ['19-04-2009', 2], ['16-08-2009', 1], ['11-11-2009', 1], ['02-12-2009', 1], ['04-12-2009', 1], ['06-12-2009', 3], ['14-12-2009', 3], ['23-12-2009', 2], ['28-12-2009', 2], ['04-01-2010', 4], ['09-01-2010', 4], ['14-01-2010', 1], ['16-01-2010', 2], ['05-05-2010', 2], ['01-11-2010', 1], ['04-11-2010', 3], ['08-11-2010', 5], ['25-11-2010', 1], ['28-11-2010', 1], ['02-12-2010', 2], ['17-12-2010', 2], ['22-12-2010', 3], ['07-01-2011', 3], ['13-01-2011', 3], ['31-01-2011', 2], ['04-02-2011', 1], ['23-02-2011', 4], ['02-03-2011', 2], ['29-10-2011', 1], ['05-11-2011', 4], ['25-11-2011', 4], ['04-12-2011', 5], ['14-12-2011', 3], ['21-12-2011', 3], ['13-01-2012', 3], ['23-01-2012', 1], ['08-02-2012', 1], ['15-02-2012', 1], ['20-10-2012', 2], ['06-11-2012', 1], ['20-11-2012', 4], ['25-11-2012', 5], ['14-12-2012', 1], ['22-12-2012', 1], ['05-01-2013', 6], ['19-01-2013', 1], ['22-01-2013', 1], ['26-01-2013', 2], ['08-11-2013', 1], ['10-11-2013', 1], ['15-11-2013', 1], ['17-11-2013', 3], ['23-11-2013', 3], ['03-12-2013', 4], ['25-01-2014', 3], ['01-02-2014', 1], ['15-02-2014', 1], ['24-11-2014', 3], ['01-12-2014', 3], ['06-12-2014', 1], ['13-12-2014', 8], ['24-12-2014', 2], ['27-12-2014', 2], ['03-01-2015', 4], ['10-01-2015', 1], ['24-01-2015', 1], ['29-01-2015', 2], ['03-03-2015', 1], ['12-11-2015', 5], ['19-11-2015', 1], ['26-11-2015', 1], ['04-12-2015', 2], ['03-01-2016', 8], ['21-01-2016', 3], ['01-02-2016', 2], ['16-10-2016', 2], ['05-11-2016', 1], ['18-11-2016', 1], ['22-11-2016', 4], ['20-12-2016', 1], ['24-12-2016', 3], ['30-12-2016', 6], ['11-01-2017', 2], ['06-12-2017', 3], ['10-12-2017', 2], ['13-12-2017', 6], ['22-12-2017', 4], ['28-12-2017', 3], ['03-01-2018', 5], ['14-01-2018', 3], ['20-01-2018', 4], ['30-01-2018', 2], ['05-02-2018', 2], ['08-02-2018', 1], ['20-02-2018', 1], ['28-03-2018', 1], ['28-10-2018', 2], ['02-11-2018', 1], ['09-11-2018', 2], ['04-12-2018', 1], ['09-12-2018', 1], ['13-12-2018', 4], ['21-12-2018', 5], ['29-12-2018', 4], ['08-01-2019', 1], ['13-01-2019', 2], ['22-01-2019', 1], ['30-01-2019', 2], ['23-10-2019', 2], ['02-11-2019', 1], ['04-11-2019', 5], ['16-11-2019', 3], ['01-12-2019', 2], ['07-12-2019', 3], ['12-12-2019', 3], ['23-12-2019', 3], ['04-01-2020', 2], ['29-02-2020', 1], ['04-03-2020', 2], ['23-04-2020', 1], ['12-05-2020', 1], ['06-10-2020', 1], ['03-12-2020', 2], ['10-12-2020', 2], ['13-12-2020', 3], ['18-12-2020', 2], ['21-12-2020', 5], ['28-12-2020', 2]]]  
for a mean duration of electricityless episodes of 2.5513513513513515j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 2.66kWc,  
and an hypothesis of 8j without electricity as acceptable  
et 103 blackout episodes (or with an power generator):  
between 2005 and 2020:

List of episodes without electricity (nb of days):

[[ '19-01-2005', 3], [ '23-01-2005', 1], [ '01-02-2005', 1], [ '12-02-2005', 2], [ '26-11-2005', 3], [ '05-12-2005', 1], [ '08-12-2005', 1], [ '12-12-2005', 6], [ '23-12-2005', 1], [ '26-12-2005', 2], [ '31-12-2005', 1], [ '04-01-2006', 4], [ '09-01-2006', 4], [ '20-01-2006', 2], [ '29-01-2006', 4], [ '03-02-2006', 2], [ '22-11-2006', 1], [ '04-12-2006', 1], [ '10-12-2006', 1], [ '22-12-2006', 5], [ '22-01-2007', 2], [ '30-01-2007', 4], [ '08-02-2007', 1], [ '01-12-2007', 1], [ '08-12-2007', 2], [ '26-12-2007', 4], [ '03-01-2008', 1], [ '06-01-2008', 4], [ '11-01-2008', 1], [ '23-01-2008', 1], [ '07-03-2008', 1], [ '17-05-2008', 2], [ '07-11-2008', 1], [ '16-11-2008', 8], [ '01-12-2008', 1], [ '04-12-2008', 1], [ '15-12-2008', 6], [ '26-12-2008', 1], [ '05-01-2009', 8], [ '24-01-2009', 1], [ '19-04-2009', 2], [ '16-08-2009', 1], [ '11-11-2009', 1], [ '08-12-2009', 1], [ '14-12-2009', 3], [ '23-12-2009', 2], [ '05-01-2010', 3], [ '09-01-2010', 2], [ '12-01-2010', 1], [ '06-05-2010', 1], [ '05-11-2010', 2], [ '12-11-2010', 1], [ '22-12-2010', 3], [ '08-01-2011', 1], [ '31-01-2011', 2], [ '06-11-2011', 3], [ '25-11-2011', 4], [ '07-12-2011', 2], [ '21-12-2011', 3], [ '14-01-2012', 2], [ '20-10-2012', 2], [ '21-11-2012', 2], [ '25-11-2012', 2], [ '28-11-2012', 1], [ '14-12-2012', 1], [ '22-12-2012', 1], [ '05-01-2013', 6], [ '19-01-2013', 1], [ '18-11-2013', 2], [ '24-11-2013', 2], [ '04-12-2013', 2], [ '25-01-2014', 3], [ '25-11-2014', 2], [ '02-12-2014', 2], [ '14-12-2014', 7], [ '05-01-2015', 2], [ '13-11-2015', 2], [ '04-01-2016', 5], [ '10-01-2016', 1], [ '23-01-2016', 1], [ '17-10-2016', 1], [ '23-11-2016', 1], [ '25-11-2016', 1], [ '20-12-2016', 1], [ '25-12-2016', 2], [ '31-12-2016', 5], [ '12-01-2017', 1], [ '22-12-2017', 4], [ '29-12-2017', 1], [ '04-01-2018', 3], [ '16-01-2018', 1], [ '21-01-2018', 3], [ '31-01-2018', 1], [ '04-12-2018', 1], [ '15-12-2018', 2], [ '22-12-2018', 4], [ '30-12-2018', 3], [ '31-01-2019', 1], [ '17-11-2019', 2], [ '02-12-2019', 1], [ '08-12-2019', 1], [ '13-12-2019', 2], [ '29-12-2020', 1]]

for a mean duration of electricityless episodes of 2.203883495145631j

we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 3.3200000000000003kWc,  
and an hypothesis of 6j without electricity as acceptable  
et 66 blackout episodes (or with an power generator):  
between 2005 and 2020:

List of episodes without electricity (nb of days):

[[ '20-01-2005', 2], [ '23-01-2005', 1], [ '01-02-2005', 1], [ '12-02-2005', 2], [ '27-11-2005', 1], [ '12-12-2005', 6], [ '27-12-2005', 1], [ '06-01-2006', 2], [ '09-01-2006', 1], [ '11-01-2006', 2], [ '29-01-2006', 3], [ '03-02-2006', 2], [ '24-12-2006', 3], [ '23-01-2007', 1], [ '01-02-2007', 2], [ '27-12-2007', 3], [ '23-01-2008', 1], [ '07-03-2008', 1], [ '17-05-2008', 2], [ '16-11-2008', 4], [ '21-11-2008', 1], [ '23-11-2008', 1], [ '19-12-2008', 2], [ '26-12-2008', 1], [ '05-01-2009', 1], [ '07-01-2009', 6], [ '19-04-2009', 1], [ '16-08-2009', 1], [ '14-12-2009', 3], [ '24-12-2009', 1], [ '05-01-2010', 1], [ '10-01-2010', 1], [ '12-01-2010', 1], [ '05-11-2010', 2], [ '23-12-2010', 2], [ '01-02-2011', 1], [ '07-11-2011', 1], [ '26-11-2011', 3], [ '21-12-2011', 3], [ '14-01-2012', 1], [ '20-10-2012', 2], [ '21-11-2012', 1], [ '26-11-2012', 1], [ '14-12-2012', 1], [ '05-01-2013', 6], [ '24-11-2013', 2], [ '05-12-2013', 1], [ '26-01-2014', 2], [ '26-11-2014', 1], [ '02-12-2014', 2], [ '17-12-2014', 3], [ '13-11-2015', 1], [ '05-01-2016', 1], [ '07-01-2016', 2], [ '17-10-2016', 1], [ '23-11-2016', 1], [ '01-01-2017', 4], [ '23-12-2017', 3], [ '06-01-2018', 1], [ '22-01-2018', 2], [ '31-01-2018', 1], [ '16-12-2018', 1], [ '23-12-2018', 3], [ '30-12-2018', 3], [ '02-12-2019', 1], [ '14-12-2019', 1]]

for a mean duration of electricityless episodes of 1.8636363636363635j

we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 3.98kWc,  
and an hypothesis of 6j without electricity as acceptable  
et 43 blackout episodes (or with an power generator):  
between 2005 and 2020:

List of episodes without electricity (nb of days):

[[ '20-01-2005', 2], [ '01-02-2005', 1], [ '13-02-2005', 1], [ '12-12-2005', 5], [ '27-12-2005', 1], [ '07-01-2006', 1], [ '12-01-2006', 1], [ '29-01-2006', 1], [ '31-01-2006', 1], [ '04-02-2006', 1], [ '25-12-2006', 2], [ '02-02-2007', 1], [ '28-12-2007', 2], [ '23-01-2008', 1], [ '07-03-2008', 1], [ '17-05-2008', 2], [ '16-11-2008', 4], [ '21-11-2008', 1], [ '08-01-2009', 2], [ '11-01-2009', 2], [ '19-04-2009', 1], [ '16-08-2009', 1], [ '15-12-2009', 2], [ '24-12-2009', 1], [ '05-01-2010', 1], [ '10-01-2010', 1], [ '06-01-2010', 1], [ '23-12-2010', 2], [ '01-02-2011', 1], [ '26-11-2011', 3], [ '22-12-2011', 2], [ '21-10-2012', 1], [ '05-01-2013', 6], [ '25-11-2013', 1], [ '26-01-2014', 1], [ '03-12-2014', 1], [ '17-10-2016', 1], [ '01-01-2017', 4], [ '23-12-2017', 3], [ '23-01-2018', 1], [ '23-12-2018', 1], [ '25-12-2018', 1], [ '30-12-2018', 3]]

for a mean duration of electricityless episodes of 1.697674418604651j

we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 4.640000000000001kWc,  
and an hypothesis of 4j without electricity as acceptable  
et 22 blackout episodes (or with an power generator):  
between 2005 and 2020:

List of episodes without electricity (nb of days):

[[ '12-12-2005', 1], [ '14-12-2005', 3], [ '27-12-2005', 1], [ '26-12-2006', 1], [ '07-03-2008', 1], [ '17-05-2008', 2], [ '17-11-2008', 3], [ '09-01-2009', 1], [ '11-01-2009', 2], [ '19-04-2009', 1], [ '16-08-2009', 1], [ '15-12-2009', 2], [ '23-12-2010', 2], [ '27-11-2011', 2], [ '23-12-2011', 1], [ '06-01-2013', 4], [ '25-11-2013', 1], [ '03-12-2014', 1], [ '02-01-2017', 3], [ '24-12-2017', 2], [ '23-12-2018', 1], [ '01-01-2019', 1]]

for a mean duration of electricityless episodes of 1.6818181818181819j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 5.300000000000001kWc,  
and an hypothesis of 4j without electricity as acceptable  
et 16 blackout episodes (or with an power generator):  
between 2005 and 2020:

List of episodes without electricity (nb of days):

[[ '14-12-2005', 3], [ '27-12-2005', 1], [ '17-05-2008', 2], [ '17-11-2008', 3], [ '09-01-2009', 1], [ '12-01-2009', 1], [ '19-04-2009', 1], [ '16-08-2009', 1], [ '15-12-2009', 1], [ '24-12-2010', 1], [ '28-11-2011', 1], [ '06-01-2013', 4], [ '25-11-2013', 1], [ '03-12-2014', 1], [ '03-01-2017', 2], [ '01-01-2019', 1]]

for a mean duration of electricityless episodes of 1.5625j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 5.96kWc,  
and an hypothesis of 2j without electricity as acceptable  
et 10 blackout episodes (or with an power generator):  
between 2005 and 2020:

List of episodes without electricity (nb of days):

[[ '15-12-2005', 2], [ '17-05-2008', 2], [ '18-11-2008', 2], [ '19-04-2009', 1], [ '16-08-2009', 1], [ '15-12-2009', 1], [ '24-12-2010', 1], [ '06-01-2013', 2], [ '09-01-2013', 1], [ '03-12-2014', 1]]

for a mean duration of electricityless episodes of 1.4j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 6.62kWc,  
and an hypothesis of 2j without electricity as acceptable  
et 5 blackout episodes (or with an power generator):  
between 2005 and 2020:

List of episodes without electricity (nb of days):

[[ '16-12-2005', 1], [ '18-05-2008', 1], [ '19-04-2009', 1], [ '16-08-2009', 1], [ '06-01-2013', 2]]

for a mean duration of electricityless episodes of 1.2j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 7.28kWc,  
and an hypothesis of 1j without electricity as acceptable  
et 4 blackout episodes (or with an power generator):  
between 2005 and 2020:

List of episodes without electricity (nb of days):

[[ '18-05-2008', 1], [ '19-04-2009', 1], [ '16-08-2009', 1], [ '07-01-2013', 1]]

for a mean duration of electricityless episodes of 1.0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 7.94kWc,  
and an hypothesis of 1j without electricity as acceptable  
et 4 blackout episodes (or with an power generator):  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[['18-05-2008', 1], ['19-04-2009', 1], ['16-08-2009', 1], ['07-01-2013', 1]]  
for a mean duration of electricityless episodes of 1.0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 8.600000000000001kWc,  
and an hypothesis of 1j without electricity as acceptable  
et 3 blackout episodes (or with an power generator):  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[['18-05-2008', 1], ['19-04-2009', 1], ['16-08-2009', 1]]  
for a mean duration of electricityless episodes of 1.0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 9.260000000000002kWc,  
and an hypothesis of 1j without electricity as acceptable  
et 3 blackout episodes (or with an power generator):  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[['18-05-2008', 1], ['19-04-2009', 1], ['16-08-2009', 1]]  
for a mean duration of electricityless episodes of 1.0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 9.92kWc,  
and an hypothesis of 1j without electricity as acceptable  
et 3 blackout episodes (or with an power generator):  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[['18-05-2008', 1], ['19-04-2009', 1], ['16-08-2009', 1]]  
for a mean duration of electricityless episodes of 1.0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis

with user input data and

a battery of 5.0kWh  
and a peak power of 10.58kWc,  
and an hypothesis of 1j without electricity as acceptable  
et 3 blackout episodes (or with an power generator):  
between 2005 and 2020:  
List of episodes without electricity (nb of days):  
[['18-05-2008', 1], ['19-04-2009', 1], ['16-08-2009', 1]]  
for a mean duration of electricityless episodes of 1.0j  
we meet the user needs (4.0kWh/jour) entered as hypothesis