

TEST REPORT

SAMPLE INFORMATION:

1. **Sample Description:** LED Street Light
2. **Trade Mark:**
3. **Models:** ARIALED S10
4. **Serial/Batch No. of Sample:** ---
5. **Manufacturer Date:** ----
6. **Manufacturer:** OrangeTek Limited
7. **Manufacturer Address:** Coach House, Blakenhall Park, Bar Lane, Barton under Needwood,
Burton upon Trent DE138AJ
8. **Sample Quantity:** 5 units ARIALED S10



CLIENT INFORMATION

1. **Applicant:** OrangeTek Limited
2. **Applicant Address:** Coach House Blakenhall Park, Bar Lane, Barton under
Needwood, Burton upon Trent DE13 8AJ
3. **Applicant Post Code:** ---
4. **Applicant Telephone:** ---+44 (0)128 371 6690

TEST INFORMATION:

1. **Applicant No:**
2. **Sampling Method:** Delivered by Applicant
3. **Date of Receipt:** 2016-01-19
4. **Issued Date:** 2016-01-19
5. **Test Item:** Input characteristic
6. **Ref. Documents for the Test:** Specified by client.

CONCLUSION:

REMARKS:

1. The test report is valid for above tested sample only and shall not be reproduced in part without written approval of the laboratory.
2. Characterization & Condition of Sample: Normal.
3. Ambient Condition During Testing: 25 ± 2 C, 50-60% RH.

Sample 1 100% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	24.04	0.1152	0.990
220	50	24.01	0.1103	0.988
230	50	23.95	0.1054	0.986
240	50	23.96	0.1010	0.983
250	50	23.95	0.0973	0.981

Sample 2 100% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	24.05	0.1153	0.990
220	50	24.02	0.1104	0.988
230	50	23.96	0.1055	0.986
240	50	23.97	0.1011	0.983
250	50	23.96	0.0974	0.981

Sample 3 100% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	24.03	0.1151	0.990
220	50	24.00	0.1102	0.988
230	50	23.94	0.1053	0.986
240	50	23.95	0.1009	0.983
250	50	23.94	0.0972	0.981

Sample 4 100% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	24.07	0.1153	0.990
220	50	24.04	0.1104	0.988
230	50	23.98	0.1055	0.986
240	50	23.99	0.1011	0.983
250	50	23.98	0.0974	0.981

Sample 5 100% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	24.01	0.1151	0.990
220	50	23.98	0.1102	0.988
230	50	23.92	0.1053	0.986
240	50	23.93	0.1009	0.983
250	50	23.92	0.0972	0.981

Watts 100% light output

Voltage\Sample	1	2	3	4	5
210	24.04	24.05	24.03	24.07	24.01
220	24.01	24.02	24.00	24.04	23.98
230	23.95	23.96	23.94	23.98	23.92
240	23.96	23.97	23.95	23.99	23.93
250	23.95	23.96	23.94	23.98	23.92

VA 100% light output

Voltage\Sample	1	2	3	4	5
210	24.192	24.207	24.177	24.221	24.163
220	24.266	24.281	24.251	24.295	24.237
230	24.242	24.257	24.227	24.271	24.213
240	24.240	24.255	24.225	24.269	24.211
250	24.325	24.340	24.310	24.354	24.296

Notes:

1. Test be conducted after operating for 12 hours to reach their steady load state.
2. The measurement uncertainties are for a confidence probability of not less than 98%.
3. The measurement uncertainties of the below value (k=2), Urel(v)=0.1% , Urel(w)=0.1% , Urel(i)=0.2% , Urel(f)=0.05% , Urel(PF)=0.5

Sample 1 70% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	17.13	0.0829	0.981
220	50	17.13	0.0795	0.978
230	50	17.10	0.0761	0.974
240	50	17.10	0.0732	0.970
250	50	17.12	0.0705	0.965

Sample 2 70% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	17.14	0.0829	0.981
220	50	17.14	0.0795	0.978
230	50	17.11	0.0761	0.974
240	50	17.11	0.0732	0.970
250	50	17.13	0.0705	0.965

Sample 3 70% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	17.12	0.0829	0.981
220	50	17.12	0.0795	0.978
230	50	17.09	0.0761	0.974
240	50	17.09	0.0732	0.970
250	50	17.11	0.0705	0.965

Sample 4 70% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	17.15	0.0830	0.981
220	50	17.15	0.0796	0.978
230	50	17.12	0.0762	0.974
240	50	17.12	0.0733	0.970
250	50	17.14	0.0706	0.965

Sample 5 70% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	17.11	0.0828	0.981
220	50	17.11	0.0794	0.978
230	50	17.08	0.0760	0.974
240	50	17.08	0.0731	0.970
250	50	17.10	0.0704	0.965

Watts 70% light output

Voltage\Sample	1	2	3	4	5
210	17.13	17.14	17.12	17.15	17.11
220	17.13	17.14	17.12	17.15	17.11
230	17.10	17.11	17.09	17.12	17.08
240	17.10	17.11	17.09	17.12	17.08
250	17.12	17.13	17.11	17.14	17.10

VA 70% light output

Voltage\Sample	1	2	3	4	5
210	17.409	17.419	17.399	17.430	17.388
220	17.490	17.500	17.480	17.511	17.469
230	17.503	17.514	17.492	17.524	17.482
240	17.568	17.579	17.557	17.589	17.547
250	17.625	17.636	17.614	17.646	17.604

Notes:

4. Test be conducted after operating for 12 hours to reach their steady load state.
5. The measurement uncertainties are for a confidence probability of not less than 98%.
6. The measurement uncertainties of the below value (k=2), Urel(v)=0.1% , Urel(w)=0.1% , Urel(i)=0.2% , Urel(f)=0.05% , Urel(PF)=0.5

Sample 1 50% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	12.64	0.0620	0.968
220	50	12.64	0.0595	0.962
230	50	12.63	0.0572	0.957
240	50	12.63	0.0551	0.950
250	50	12.66	0.0534	0.943

Sample 2 50% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	12.65	0.0620	0.968
220	50	12.65	0.0595	0.962
230	50	12.64	0.0572	0.957
240	50	12.64	0.0551	0.950
250	50	12.67	0.0534	0.943

Sample 3 50% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	12.63	0.0620	0.968
220	50	12.63	0.0595	0.962
230	50	12.62	0.0572	0.957
240	50	12.62	0.0551	0.950
250	50	12.65	0.0534	0.943

Sample 4 50% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	12.66	0.0621	0.968
220	50	12.66	0.0596	0.962
230	50	12.65	0.0573	0.957
240	50	12.65	0.0552	0.950
250	50	12.68	0.0535	0.943

Sample 5 50% light output

Input voltage(V)	Frequency(Hz)	Input power(W)	Input current(A)	Power factor
210	50	12.62	0.0619	0.968
220	50	12.62	0.0594	0.962
230	50	12.61	0.0571	0.957
240	50	12.61	0.0550	0.950
250	50	12.64	0.0533	0.943

Watts 50% light output

Voltage\Sample	1	2	3	4	5
210	12.64	12.65	12.63	12.66	12.62
220	12.64	12.65	12.63	12.66	12.62
230	12.63	12.64	12.62	12.65	12.61
240	12.63	12.64	12.62	12.65	12.61
250	12.66	12.67	12.65	12.68	12.64

VA 50% light output

Voltage\Sample	1	2	3	4	5
210	13.020	13.028	13.012	13.036	13.004
220	13.090	13.098	13.082	13.106	13.074
230	13.156	13.164	13.148	13.172	13.140
240	13.224	13.232	13.216	13.240	13.208
250	13.350	13.358	13.342	13.366	13.334

Notes:

7. Test be conducted after operating for 12 hours to reach their steady load state.
8. The measurement uncertainties are for a confidence probability of not less than 98%.
9. The measurement uncertainties of the below value (k=2), Urel(v)=0.1% , Urel(w)=0.1% , Urel(i)=0.2% , Urel(f)=0.05% , Urel(PF)=0.5

Photograph of Sample

Photo 1 View of EUT



Photo 2 View of EUT

