My name is Peter Dawson and I own Lot 14, DP 1135106 in the Shire of Uralla. Please note in your letter to me from A/Team Leader Resources and Energy Assessments Iwan Davies dated 12 February 2019 (SSD 9255), I was identified as a landowner of property (Lot 14, DP1135106) adjacent to the development proposed by UPC Renewables. That development being the New England Solar Project (SSD 9255).

I wish to formally record my objection to the project, with particular focus on the southern array which adjoins my property. In that respect, my position is that the southern array is ill-conceived, inappropriately located on prime agricultural land, and lacks proper thought other than it has convenient proximity to the trans-grid line. Further, my position is that the southern array should be removed from the overall development proposed by UPC. My reasons and specific objections to the southern array component of the development are detailed below:

- 1. LAND USE. The New England Tablelands in general is recognised as a highly productive agricultural area with, on average, good seasonal rainfall to support that productivity. Specific pockets of that area contain very rich alluvial basalt soil - one such area being the Salisbury Plains which is a target area for the southern array. The Salisbury Plains lends itself to both farming and grazing activities which, on any agricultural assessment, is the envy of most professional agriculturalists. Further, the majority of agricultural land contained within the southern array is classified as BSAL or 'Biophysical Strategic Agricultural Land'. To carpet this land mass with solar panels makes no sense in terms of the loss of agricultural productivity from high value strategic land. It is not a defence by the developer to suggest that it has reduced its footprint on BSAL land following project refinements. The point is that it is simply not appropriate to place a development of this type on BSAL land. Nor is it a defence by the developer to suggest that some grazing activities can continue in harmony with the solar development. It's fanciful to suggest that farm animals (sheep) can be managed in and around fields of solar panels, not to mention the WHS risks inherent in that management. The proposal to place this sort of development on BSAL land also potentially conflicts with the State Government's regional land use policy.
- 2. VISUAL. The visual impact of the southern array in the EIS is mainly assessed via certain viewpoints. That assessment seems to be full of ineffective mitigations and assumptions geared to do nothing other than support the project. I have selected the following viewpoints to make comment:
- Viewpoint 1. This is a rental house located on Salisbury Plains Road approximately 1.6kms east from the intersection of Thunderbolts Way and Salisbury Plains Road. The home will be surrounded by panels to the north/east and to the south/west. The impact here is significant and no matter how far the nominated set back, there will be significant visual impact. Screening trees on the Salisbury Plains can take up to 20 years to gain sufficient height to be of any real use which is almost the project life. I submit that the visual impact here would be such that no mitigation would be effective. The developer has avoided responsibility by saying that "potential impacts at this dwelling will be subject to further discussions between UPC, the project landholder and the tenant.....".

- Viewpoint 2. This is the property owned by Corrine and Richard Annetts. The property and house will be surrounded by panels to the east (550m) and south (220m). I note that UPC has acknowledged that the "project infrastructure within the southern array will be visible from this location". The impact here is significant and I note that UPC has decided to place restrictions on negotiations with Corrine and Richard based on Corrine and Richard's opposition to the development and, in particular, the southern array. Once again, mitigation measure such as extra planting of trees etc will take up to 20 years to grow.
- Viewpoint 4. This is Graham and Kim Heagney's home which will directly overlook the southern array to the east and south. Graham and Kim have some existing trees around their home but beyond that the field of vision to the southern array is uninterrupted. I note that UPC have once again avoided any responsibility here by stating that "no additional measures are warranted based on the evaluation of significance".
- Viewpoint 12. This is taken from Thunderbolts Way and it is too far from the array to be useful as an assessment shot. This has resulted in UPC deciding that the visual sensitivity is low and "there would be no significant impact from this viewpoint". This then leads me to compare this shot with a photo I have attached which is taken from my rear boundary but not too far from this viewpoint. I would suggest the visual impact is significant at any point from the rear of my property through to the Salisbury Creek and beyond in a southerly and easterly direction. I am impacted in a major sense and I will not be able to escape the fields of solar panels. My boundary ends at the Salisbury creek so the closer I move in a southerly direction, the closer I am to the fields of solar panels. This not only has the potential to impact the capital value of my property, I am also currently in negotiation with Uralla Shire Council seeking permission to erect a dwelling. Not a good prospect when I may be waking up to a view of solar panels. I find it telling also that UPC has not approached me to gain access to my property to gain a more representative photo. I SUBMIT THAT VIEWPOINT 12 IS NOT REPRESENTATIVE AND MY ATTACHED PHOTO OF THE EXPANSIVE VIEW OVER SALISBURY PLAINS FROM MY ADJOINING PROPERTY SUPPORTS THAT POSITION.
- Viewpoint 13. This is taken from the intersection of Salisbury Plains Road and Thunderbolts Way. The view from the intersection, and from the north and south as a motorist and adjoining landowner is basically an uninterrupted view of a large expanse of solar panels. This requires a large setback from Thunderbolt's Way to be even remotely acceptable. This section is contained within property owner Tony Heagney's land and is a stain on the overall landscape. The homestead 'Salisbury Court' (S16) is semi shielded by a row of pine trees but exiting the homestead onto Thunderbolts Way one would be greeted by nothing but Solar. I find it incomprehensible that UPC could conclude that project refinement is "not applicable" in this area. While they rate the impact on motorists as "moderate" they downplay the significance by stating that the travelling public will have "views of project infrastructure for no more than 72 seconds over a distance of approximately 2km" and that the "project infrastructure will not be the primary view" of motorists. No consideration is given to the fact that Thunderbolt's Way is a main arterial route to Uralla for tourist traffic and I'd suggest that the impact on the desirability of visiting Uralla and surrounds will be significant.
- 3. WATER. The treatment of water and flooding by UPC in the EIS is a major concern. I am 64 years of age and I have a lifetime of experience having viewed countless floods, run off scenarios and overbanking and breaches of the Salisbury Creek. In this respect, the proposition by UPC of placing solar panels on the Salisbury Flood Plain is lunacy. This is not

my sole view, but is supported by adjoining landowners and residents of the Salisbury Plains area. I am mystified that UPC has not sought this information but has, instead, relied on flawed flood modelling. I can report with 100% certainty that placing solar panels on the Salisbury flood plain is a disaster waiting to happen. I am not prepared to accept the prospect of solar panels being tangled with debris which will also potentially present a risk to my fencing and stock yard infrastructure given my boundary adjoins the proposed development along the Salisbury Creek. Logic also tells me that this presents high risk to the developer and its investors. Other specific points detailed below expand on these concerns:

- Section 2.7 of the Appendix acknowledges potential sources of impact and a reference is made to the "project refinement process" in the main EIS document. In the main EIS document (page 11 under 'Water') it is stated that "the development footprint provides appropriate setbacks from all third order steams and higher". I note that Salisbury Creek is a 6th order stream requiring a nominated 50m setback but I submit that even this set back is grossly inadequate. My experience tells me that no set back will mitigate against the flaws inherent in placing solar panels on the flood plain the flood plain needs to be excluded from the southern array completely.
- Further, if one looks at the flood modelling map at Figure 4.4 in the Appendix, it generally conforms to the UPC statement on page 24 that "flooding generally follows the alignment of watercourses, with no substantial overbank flooding or breakout events". This statement and the '1 in 100 year flood modelling' (ie a flood event that has a 1% probability of occurring in any given year) that has been supposedly adopted by UPC runs counter to my experience. Namely, a large flood event normally occurs every 10-20 years with the last one being 2009/10. During large flood events, there can be major breakouts and overbank flooding which carries a wider incursion into the flood plain than that depicted on the map. The combination of those breakouts and overbank flooding when met with run off from paddocks on higher ground can have the food plain resembling a 'sea' of water of varying depths. I note that UPC has a nominated tolerance of 300mm depth and I can assure you that some areas on the flood plain generally would far exceed this depth - and this area goes beyond the nominated setbacks on the map. Given the lack of existing flood data (as acknowledged by UPC), I submit that the flood modelling used and the assumptions and rain data included, have provided a flawed picture of flood impacts. By way of extension also, I have concerns as to the potential for altered flood flows directly stemming from placing solar panels on the flood plain. This potentially will have major consequences for my land by the heightened risk of water flows being altered and directed onto my land, despite the assurances of management safeguards.
- Further, as indicated above, I think it's important to note that I wasn't contacted by UPC to provide input into the flood investigations, and I doubt whether any constructive information was sought from local landowners who have lived in the area of Salisbury Plains for some time. This is a dangerous approach and places a heavy reliance on modelling which has a history of mixed results.
- It is noted that UPC will satisfy their water needs by importing water, both during the construction phase and during operation. No-where in the EIS can I see a detailed explanation of what will be done to mitigate the following:

- The impact on ground water other than a comment that " the project is not likely to impact ground water during construction, operation and decommissioning due to the estimated depth to ground water --- and the limited amount and depth of subsurface disturbance activities required during the installation and decommissioning of project infrastructure----". This statement smacks of assumptions and is not good enough. I note the stated varying estimated depth of ground water ranges from 3m to 20m. At a minimum depth of 3m I submit that contamination is a real possibility. Also, what assurances are there as to the quality of water imported.
- Section 5.4.1 of the Appendix notes the "risk to water quality associated during construction will occur as a result of ground disturbance during earthworks and other site activities (eg installation of PV modules, trenching for the MV cable network and services if required, grading for new internal roads-----). There is potential that these works will lead to exposure of soils and potential erosion and mobilisation of sediment into receiving water courses. Potential impacts to water quality are considered minor and manageable------". Once again, these are assumptions that are not good enough and I note the apparent contradiction between the assessments of the extent of disturbance when talking about risk to ground water compared to run off during construction.
- Further to the dot point above, there are two important variables that require detailed examination by UPC. Firstly, when the EIS talks about ground water, it is referring to a large aquifer that runs under the flood plain. I question whether UPC has undertaken the process required under the 'NSW Aquifer Interference Policy' in terms of the framework for assessing the impacts of aquifer interference activities on water resources. The aquifer in question feeds into bores and both stock and households take from this source. The second point is that the Salisbury flood plain is a catchment for the Macleay River at Kempsey on the North Coast of NSW. Placing solar panels on a flood plain and the risk of contamination flowing into the Salisbury Creek and onto the Macleay River is a matter of serious concern. Macleay River catchment issues are governed by separate policy and management instruments and I question whether UPC has covered off this area. In addition, it is my understanding that solar panel material degrades over time and UPC has not addressed the potential for chemical leaching into the aquifer and watercourses.
- 4. ECONOMIC AND SOCIAL IMPACTS. UPC has, apparently, factored in a meagre 0.0176% of annualised annual profit as a local fund incentive. This is grossly inadequate and a projected 15 FTE employment figure is also grossly inadequate when one considers the loss of employment in the local agricultural sector as a direct result of the development. Further, I question the long term viability of local businesses in the Uralla area once an industrial landscape has been established this will also have major impacts on both residential and rural property values when, inevitably, the once iconic rural landscape becomes unattractive to new 'tree change' residents. A genuine study of the long term social and economic impact of this development is urgently needed. The default premise that these types of developments benefit the local community needs to be tested.
- 5. **CUMULATIVE IMPACTS.** As DPE would be aware, UPC is not the only developer wishing to establish a large footprint on the Salisbury Plains. It is my understanding that Energy Estate and Mirus Wind seek to further change the nature of the local landscape in this area to the point that it will be unrecognisable. This will represent a significant overdevelopment proposition. In my view, it is now critical that DPE seek to establish important ground rules and expectations for UPC that will be the benchmark for future developments.

CONCLUSION. It is my view that I have established important and valid objections to UPC's southern array solar development on the Salisbury Plains. It is my view also that I have established that position both as an adjoining land owner and as a concerned local resident of the New England area.

In summary, I am seeking DPE's support to remove the southern array from UPC's New England Solar development. As detailed above, my request is based on the above key points:

- The visual impact of the development is significant and no amount of mitigation by screening can offset the impact. The EIS fails to address or even remotely ameliorate this reality. MY ATTACHED PHOTOGRAPH HIGHLIGHTS THE POTENTIAL FOR VISUAL POLLUTION THAT A BACKGOUND OF SOLAR PANELS WOULD PROVIDE.
- The water and flooding risks are significant and to contemplate placing solar panels on a recognised flood plain is an untenable proposition. Further, the EIS does not accurately reflect the reality of the water and flooding issues.
- The **land use** shortfall highlights the need to protect high value agricultural land for future generations. The entirety of the southern array is predominately high value alluvial basalt soil and is classified as BSAL. The floodplain is alluvial to a significant depth. The EIS offers no answer to quarantining important strategic land other than the glib position that we didn't take as much as the original footprint proposed. This is unacceptable.
- The assumed **economic and social benefits** to the local area and town are nothing more than shallow assumptions that need to be tested via a rigours study. The EIS offers no supporting evidence for these assumptions.
- The **cumulative impacts** for other developments coming on line in the Salisbury Plains area is cause for grave concern in terms of massive overdevelopment. Now is the time to set ground rules and benchmarks and it is incumbent on DPE to drive this as urgently as possible.

Thanks you for reading my submission.

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