### 7<sup>th</sup> February 2024 - 6.30pm

### COOKSON ROOM

### Present

Martin Andrew (MA), Liam Lewis, Sue Totty, Terry Hurst, Paul Jamieson, Jo Lloyd, Martyn Green, Dave Stonley, Chris Hornsby, Jo Ratcliffe, David N Jones

Remote: Jonathan Dalton – Dales Water, Lee Knight – Irrigation Control

### Apologies

Hywel Jones

### **Remit of Meeting**

To meet with Dales Water and Irrigation Control representatives to further discussions around recommendations for water volumes, borehole diameter, and timelines for project progression. Review of Action plan and progression to date.

### **Meeting with Dales Water & Irrigation Control**

### <u>Volumes</u>

Maximum volumes proposed by Adrian Mortram within his specification of 12 cubic metres per hour are confirmed to have been increased to 20 cubic metres per hour (150 cu m per day, and 15k cu m per annum between March and October). This will give greater flexibility during the irrigation cycle, providing more opportunity to draw larger quantities where required.

Jonathan notes that the Environment Agency will review our application more closely on the increased figure, which may come with more requirements, (such as looking at SSI's, checking for water based features in our radius area etc) however they do believe it is appropriate to request the raised sum as it is difficult to increase further down the line.

This figure can be revised if required, and may also have a bearing on the borehole diameter.

The usable capacity is 160 cubic metres per day – on a 20 cubic metre per hour flow there would theoretically be a maximum capacity available of 480 cubic metres. However, the group agree that 150 cubic metres, as per the current draft application, is appropriate.

### **Borehole Diameter**

Revised figures for borehole quotation are as follows (inclusive of admin responsibilities):

£81,960 & vat – 8" bore diameter

 $\pm 64,460 \& vat - 6'' bore diameter$ 

To assist in reaching a decision on the appropriate bore diameter, Jonathan discussed the main pro's and cons for each size:

For the 8" bore diameter there is more internal rock face providing more surface water, better ability to install a larger infrastructure, and increased benefits in drawing water out of the ground.

Negatives include the prohibitive cost difference between the two sizes, drilling takes longer, more waste created, bigger process overall.

For a 6" hole size they would use a pump with 4" diameter

For an 8" hole size they would use a pump with 6" diameter

The life span of the pumps depend on how much is pumped, how many times it is turned on/off, water quality it is sat in etc – however estimated life span is 5 years and it comes with a 1 year warranty from the manufacturer.

Replacements rough costs – 4" £1600-£1800, 6" £3000-£3500 for supply.

Jonathan confirmed pump servicing is not required – these are next day items in the case of a full breakdown and are readily available.

Cost savings between the two pump sizes are negligible.

As an example – on a current job they have installed a 6" bore diameter but cannot fit a large enough pump in the ground to extract the available water so this is another potential draw-back to fitting the smaller bore diameter.

On initial discussions, Jonathan believed that we are on the cusp for both sizes. However, as we may extend our current irrigation provision in the coming years, he agrees with Lee Knight that it would seem more prudent to opt for the 8" to future-proof the project. Lee notes that, as the design has an envisaged life span of 25 years plus, most clients do tend to expand their irrigation usage within a few years so it would be wise to consider the 8" option.

There will be a gradual fall off in yield over time, however as long as we use the system sustainably and have a maintenance routine in place, this should not be of any significance. The pump can fur up over time but we can implement measures to prevent this.

We are also planning on looking at other water resources such as rainwater harvesting – MA will visit another club who has recently invested in an installation to view this in action.

The current extraction licence is for 6,000 cubic metres per year, increasing to 15,000 will cover both current and future requirements sufficiently.

No test drilling has been carried out – we are required to wait for formal acknowledgement of our draft application which has now been submitted, after which the Environment Agency will revert to advise points for consideration, followed by field work, report submission to conclude with EA consent.

# <u>Timeframes</u>

Borehole consent – estimated mid-March

Drilling commencement – estimated shortly thereafter subject to Dales Water workload (if consent proves more slow, may push drilling to mid April region). Work all carried out in compound and will not impact golf.

Water tank not required prior to drilling borehole – infrastructure will be in place February.

Disposal site to be agreed – possibly moving current spoil mound – estimated waste generated approx. 1-2 8T skips. No issues around controlled disposal regulations as this should be wet rock.

### **Revised Bill of Quantities**

All information has now been requested from suppliers by Irrigation Control – some have already responded favourably on previous rates.

Toro and Rainbird have been asked to respond as soon as possible with a view to presenting the revised costings early next week (week commencing 12<sup>th</sup> February).

Remote session ended 6.20pm.

The group agreed that, costings should include for the 8" bore diameter as we seek to finalise the full project totals. No agreement is requested now, but will be required at an appropriate stage.

## **Project Action Plan**

Paul Jamieson provided an updated system status report.

Risks have been identified on the report as follows:

- The loan scheme is identified as Amber – ie potential for risk to overall finance if we have reduced intake on original applications. JL will review outstanding monies a week from today, with a view to contacting those who have yet to respond by telephone.

The recent email from Chair of Council also reminded members that the loan scheme remains open, and that there is the possibility to expand for drainage works if further applications are received.

- Issues around drainage continue to be a potential risk to this project including the risk of withdrawal of member support following the receipt of a request to hold another EGM to discuss irrigation and drainage which is shortly to be discussed at Council.
- Risks arising from our Course Manager's unexpected resignation have been mitigated by the prompt appointment of our Acting Deputy and Course Manager.

In terms of project deliverables, final costs should be in earlier than the estimated target date of 1<sup>st</sup> March, with the revised bill of quantities expected week commencing 12<sup>th</sup> February. MA also notes that there are still further opportunities to reduce costs, such as removal of the weather station, and other changes which can save further money without compromising performance.

Discussions with other financial institutions continue to identify the best options for financing and loan extensions. This may enable us to reduce HP requirements.

On 3 phase electricity, we have reverted to Scottish Power for a further quotation for new measurements of cable and are currently evaluating an alternative approach to this work to reduce costs alongside Jonathon Andrew. This revised quote option A is for £25K & Vat for a meter position 480m from the transformer. There would be additional costs for the club to connect to the electricity board. Option B is for £3K & vat with the club engaging an external contractor to carry out the total works. Jonathon Andrew will review both options fully next week.

# Communication

Sue Totty will review information from this meeting to identify the next update for members. This could be posted in the atrium area alongside a plan of the course which identifies irrigation positioning

including borehole and pumphouse, a note to confirm that re-routing of the irrigation pipework has been specifically planned to ensure any drainage work is not affected.

## **Equipment Suppliers**

As MA and LL consider Toro and Rainbird to be very comparable in products and pricing, MA confirms that we would not be reducing quality by choosing one company over the other if we base this on price.

There may be an opportunity to either receive upgraded products over those initially specified (especially with Toro) or to ask for further reductions in the overall cost.

## Water Storage

Nick Belderbos is liaising with Neil Culkin on our planning application for this item.

Martin Andrew will provide an update to Council at the next meeting, in line with the status report collated by Paul Jamieson.

Date of next meeting TBA.