

#### Stock Data

Share Price:	5.05p
Market Cap.:	£78.82m
Shares in issue:	1,560.7m
52 week high/low:	8.78p/3.40p

#### Company Profile

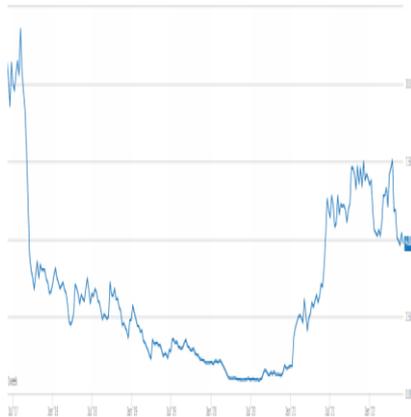
Sector:	Oil & Gas
Ticker:	ZPHR
Exchange:	AIM

#### Activities

Zephyr Energy ('Zephyr', 'the Group') is an independent oil and gas E&P company with a strategic focus on carbon-neutral hydrocarbon development projects in the Rocky Mountain region of the US.

[www.zephyrplc.com](http://www.zephyrplc.com)

#### 5-year share price performance



Source: [LSE](https://www.lse.com)

Past performance is not an indication of future performance.

#### Contact details

Tel: 0203 657 0050  
Email: [info@turnerpope.com](mailto:info@turnerpope.com)  
Web: [www.turnerpope.com](http://www.turnerpope.com)

Andrew Thacker  
Corporate Broking and Sales

Barry Gibb  
Research Analyst

TPI acts as sole broker to Zephyr Energy.

Attention is drawn to the disclaimers and risk warnings at the end of this document.

Retail clients (as defined by the rules of the FCA) must not rely on this document.

## Zephyr Energy plc

Following completion of the successful test on the State 16-2LN-CC well in December 2021, and after a detailed evaluation of various options for natural gas sales and export, Zephyr's Board has elected to recommence production from the well in conjunction with the completion of a new Zephyr owned crypto-currency mining facility on the State 16-2 well pad which is now under development. Investment required to launch the initial 1 megawatt ('MW') crypto-mining facility (capital expenditure forecast to be less than US\$2 million) will be taken from existing cash resources or in conjunction with third party investors, with facility capital payback expected in under two years at current crypto-currency prices. By fast-tracking equipment procurement to enable the crypto-mine to become operational in c.8-12 weeks, with necessary well work being conducted on the same timeframe, Zephyr's Board expects to meet multiple objectives. These include accelerating revenue generation from the State 16-2LN-CC well, earning additional revenues from the crypto-mine infrastructure and enabling a highly important long-term test capable of providing significant additional information about the well's production profile. In parallel with this, funding for the planned three well drill programme on the Paradox project that is expected to commence in 2H 2022, will be provided from the Group's Williston Basin non-operated assets. Altogether this sets Zephyr up for a further period of intense activity in the run-up to 2023 as it moves closer toward its ultimate goal of unlocking the next great unconventional onshore resource play in the US.

### Co-location of crypto facilities makes economic & environmental sense

Conservationists and locals have long criticised flaring, both as an eyesore and for taking an environmental toll in the pristine southern Utah landscape known for being a Dark Sky area. As a result, the past twelve months have seen a growing number of US upstream oil and gas operators (including an immediately adjacent Paradox Basin oil and gas operator) choosing to co-locate crypto-mining facilities at well sites in order to benefit from the growing demand for natural gas to fuel dedicated sources of power generation. About the size of a shipping container, such mobile units house an off-the-grid mobile data centre, a wall of air conditioners and a number of computers running complex algorithms in order to virtually extract Bitcoins.

Design work, permitting and procurement is largely complete to prepare the well for production re-start and to build an initial 1 megawatt ('MW'), rate constrained 'beta test' crypto-mining facility. Restarted production from the State 16-2 LN-CC well and production from the initial phase of the mining facility is expected to be brought online within 8-12 weeks. CryptoKnight Energy, an experienced operator of oil industry co-located crypto mining operations, will serve as the general contractor for the construction and as the long-term operator of the mining facility.

Following review of the beta test operations, Zephyr may elect to build up to 4MW of power generation and crypto-mine facilities on the pad. The Group is evaluating a range of third-party investment options in the event it elects to expand the crypto-mining infrastructure and will provide updates on the outcome of these discussions following the results from the beta test. In addition, Zephyr plans to maintain its commitment to carbon neutral operations by offsetting any CO<sub>2</sub> emissions produced by the crypto-mine and associated generators.

As the past few months of exceptional volatility has, of course, amply demonstrated,

this investment introduces a new degree of uncertainty for shareholders. But given that the facility capital payback is expected in under two years at current crypto-currency prices (and that the computer equipment purchased will retain significant aftermarket value), it is likely that they will agree that this is a better option than simply containing gas that cannot yet be transported, while recognising that Zephyr's strict ESG credentials means its Board would never consider the alternative of torching. Over the medium-to-longer-term, however, the Zephyr expects to utilise an alternative solution for the majority of its gas production by tying it to nearby gas export infrastructure recently purchased by Dominion Energy ('Dominion'), the Fortune 500 Company, which currently services over seven million US customers. Dominion has made public its plans to refurbish and expand the natural gas infrastructure running across the Group's acreage, and the infrastructure is expected to be available to accept gas volumes from Zephyr's Paradox wells in 2023. Depending on the level of gas prices and Bitcoin yields, Zephyr will be able to retain a degree of flexibility with respect to how it might most profitably channel its economic output on behalf of shareholders.

### Opening up of a commercial Cane Creek play

On 8 December 2021, Zephyr announced the completion of a safe and highly successful well test at the State 16-2 LN-CC well. Over a period of 23 days, the well demonstrated substantial production potential that management considers open up opportunity for a commercial Cane Creek play in its White Sands Unit. Following completion of the well test, Zephyr undertook detailed appraisal of its interim and longer-term options for the sale of both its liquid volumes and produced natural gas.

For the interim period, Zephyr's Board has elected to recommence production from the State 16-2LN-CC well, whereby:

- Liquid volumes produced from the well will be trucked and sold to refineries in Utah;
- Gas volumes will be sold to a Zephyr-owned crypto-mining facility to be built/co-located on the State 16-2 well pad;
- Valuable, longer term production data will be gathered while the produced gas is used to fuel the crypto-mine facility.

Site preparation work commenced in early May 2022, when 1,185 barrels of oil condensate produced and stored onsite during the December 2021 production test were hauled and sold to a refinery in Salt Lake City. Zephyr received a realised price US\$103.36 per barrel, net of transportation costs, for those volumes. Importantly in this respect, the 60 API liquids produced are considered ideal for blending with heavier Utah crude and currently command a premium to WTI price per barrel at the refiner.

### Paradox Basin three well drilling programme on track to commence in 2H 2022

Zephyr remains firmly on track to commence its planned three well drilling programme before the end of FY2022. State 16-2 LN-CC production tests have already indicated a rate constrained average of 716 boe/d with peaks of 1,083 boe/d, all with very limited pressure drawdown. Modelling suggests the well is capable of production plateau rates of 10 million cubic feet of gas per day and 500 bopd of liquids (average total of 2,000 boepd). Potential risks remaining to be managed include water saturation, reservoir pressure and hydrocarbon fluid type. Based on at least 150 (unrisked) locations to drill, however, a successful three-well programme in 2022 could lead to a significantly larger FY 2023 development and delineation programme.

### Zephyr's Planned Three Well Drilling Programme

#### Upcoming Planned Well Operations - fully funded & designed to test Three Independent Plays



#### White Sands Unit

- State 36-2 LN-CC
  - Cane Creek reservoir delineation/development well
  - 'Prove' up 'western' area of the WSU 3D
- State 36-3 LN-C9
  - Clastic 9 (C9) exploration well
  - Test the C9 reservoir potential to host a resource play
  - New play test

#### Cane Creek Field Area

- New Cane Creek Area DSU
- Test Cane Creek oil play with modern stimulation
- Independent targets that can potentially mature a substantial resource/reserve
- Move toward greater field development
- Delineation of a new play, partial de-risking of other clastics

Source: Zephyr, [Turner Pope Investments/Vox Markets Investor Webinar – May 2022](#)

Recent development milestones for the three planned well operations include:

- All well design work has been finalised;
- All permit applications have been filed;
- Stimulation optimisation is well advanced;
- The vendor selection process continues, with rig contract award a key short-term objective;
- Partner outreach, both with potential upstream and midstream counterparties, is well underway.

### **CPR 2022 illustrated potential Contingent & Prospective Resources worth well in excess of US\$1 billion**

Zephyr's decision to recommence production from State 16-2LN-CC well by co-locating a crypto-mining facility appears to make both economic and environment sense, providing shareholders with opportunity for payback within 2 or less years while offering longer-term options in anticipation of a degree of volatility in both gas and Bitcoin prices.

Publication of the Group's Competent Person's Report ('CPR') 2022 on 26 April 2022, meanwhile highlighted Zephyr's substantial remaining potential in the Paradox Basin. While the range in values illustrated in Sproule's report presently remain very wide and recognising that there are still significant underlying technical/operational risks to be surmounted, Zephyr's management and exploration team have demonstrated a high level of intuition along with the capacity to meet such challenges through carefully calculated process. It now aims to build on its current knowledge and track record in order to further accelerate the value growth from its existing portfolio. Plans to commence drilling of three fully-funded Cane Creek wells in 2H 2022, will enable further delineation and increase overall understanding of the Paradox asset base. Management's goal is to have assessed potential upside and determined the first of a series of follow-on next steps before the end of 2022, followed by increases in all reserve and resource classes during Q2 2023.

Significantly in this respect, funding for the next phase of development of the Paradox Project will be provided from the Group's Williston Basin non-operated assets. These delivered Q1 2022 operational production rates that averaged 1,643 boepd, for which nearly half of the next two years' production has already been hedged at an average of US\$92.70/bbl. To this, Zephyr has now also positioned itself to be generating production plus additional cashflow from its previously drilled and completed State 16-2 well before the start of 2023.

**(Risk warning: Future performance and forecasts are not a reliable indicator of future results.)**

**THIS DOCUMENT IS NOT FOR PUBLICATION, DISTRIBUTION OR TRANSMISSION INTO THE UNITED STATES OF AMERICA, JAPAN, CANADA OR AUSTRALIA.**

### **Conflicts**

This is a non-independent marketing communication under the rules of the Financial Conduct Authority (“FCA”). The analyst who has prepared this report is aware that Turner Pope Investments (TPI) Limited (“TPI”) has a relationship with the company covered in this report. Accordingly, the report has not been prepared in accordance with legal requirements designed to promote the independence of investment research and is not subject to any prohibition on dealing by TPI or its clients ahead of the dissemination of investment research.

TPI manages its conflicts in accordance with its conflict management policy. For example, TPI may provide services (including corporate finance advice) where the flow of information is restricted by a Chinese wall. Accordingly, information may be available to TPI that is not reflected in this document. TPI may have acted upon or used research recommendations before they have been published.

### **Risk Warnings**

Retail clients (as defined by the rules of the FCA) must not rely on this document. Any opinions expressed in this document are those of TPI’s research analyst. Any forecast or valuation given in this document is the theoretical result of a study of a range of possible outcomes and is not a forecast of a likely outcome or share price.

The value of securities, particularly those of smaller companies, can fall as well as rise and may be subject to large and sudden swings. In addition, the level of marketability of smaller company securities may result in significant trading spreads and sometimes may lead to difficulties in opening and/or closing positions. Past performance is not necessarily a guide to future performance and forecasts are not a reliable indicator of future results.

AIM is a market designed primarily for emerging or smaller companies and the rules of this market are less demanding than those of the Official List of the UK Listing Authority; consequently, AIM investments may not be suitable for some investors. Liquidity may be lower and hence some investments may be harder to realise.

### **Specific disclaimers**

TPI acts as sole broker to Zephyr Energy plc (“Zephyr Energy”) which is listed on the AIM Market of the London Stock Exchange (‘AIM’). TPI’s private and institutional clients may hold, subscribe for or buy or sell Zephyr Energy’s securities.

Opinions and estimates in this document are entirely those of TPI as part of its internal research activity. TPI has no authority whatsoever to make any representation or warranty on behalf of Zephyr Energy.

### **General disclaimers**

This document, which presents the views of TPI's research analyst, cannot be regarded as "investment research" in accordance with the FCA definition. The contents are based upon sources of information believed to be reliable but no warranty or representation, express or implied, is given as to their accuracy or completeness. Any opinion reflects TPI's judgement at the date of publication and neither TPI nor any of its directors or employees accepts any responsibility in respect of the information or recommendations contained herein which, moreover, are subject to change without notice. Any forecast or valuation given in this document is the theoretical result of a study of a range of possible outcomes and is not a forecast of a likely outcome or share price. TPI does not undertake to provide updates to any opinions or views expressed in this document. TPI accepts no liability whatsoever (in negligence or otherwise) for any loss howsoever arising from any use of this document or its contents or otherwise arising in connection with this document (except in respect of wilful default and to the extent that any such liability cannot be excluded by applicable law).

The information in this document is published solely for information purposes and is not to be construed as a solicitation or an offer to buy or sell any securities or related financial instruments. The material contained in the document is general information intended for recipients who understand the risks associated with equity investment in smaller companies. It does not constitute a personal recommendation as defined by the FCA or take into account the particular investment objectives, financial situation or needs of individual investors nor provide any indication as to whether an investment, a course of action or the associated risks are suitable for the recipient.

This document is approved and issued by TPI for publication only to UK persons who are authorised persons under the Financial Services and Markets Act 2000 and to professional clients, as defined by Directive 2004/39/EC as set out in the rules of the Financial Conduct Authority. This document may not be published, distributed or transmitted to persons in the United States of America, Japan, Canada or Australia. This document may not be copied or reproduced or re-distributed to any other person or organisation, in whole or in part, without TPI's prior written consent.

Copyright © 2022 Turner Pope Investments (TPI) Limited, all rights reserved.