

# Leukaemia Lymphoma Research and NCRI Working Group Pick a Winner Programme (LI-1) Trial

<b>Submission date</b> 29/11/2010	<b>Recruitment status</b> No longer recruiting	<input checked="" type="checkbox"/> Prospectively registered <input type="checkbox"/> Protocol
<b>Registration date</b> 14/03/2011	<b>Overall study status</b> Completed	<input type="checkbox"/> Statistical analysis plan <input checked="" type="checkbox"/> Results
<b>Last Edited</b> 04/10/2021	<b>Condition category</b> Cancer	<input type="checkbox"/> Individual participant data

## Plain English summary of protocol

<http://cancerhelp.cancerresearchuk.org/trials/a-trial-looking-sapacitabine-AC220-vosaroxin-cytarabine-acute-myeloid-leukaemia-aml-li-1>

## Contact information

### Type(s)

Scientific

### Contact name

Prof Alan Burnett

### Contact details

Department of Haematology,  
7th floor, School of Medicine,  
University Hospital of Wales,  
Heath Park,  
Cardiff  
United Kingdom  
CF14 4XN

## Additional identifiers

### Clinical Trials Information System (CTIS)

2011-000749-19

### Protocol serial number

Version 1, November 2010

# Study information

## Scientific Title

Leukaemia Lymphoma Research and NCRI Working Group Pick a Winner Programme (LI-1) Trial  
Trial: Multicentre phase II/III interventional study

## Acronym

LI-1

## Study objectives

Standard care treatment for Acute Myeloid Leukaemia (AML) patients over the age of 60 not fit for intensive chemotherapy may be improved upon either in combination with novel agents or by use of novel agents alone

## Ethics approval required

Old ethics approval format

## Ethics approval(s)

LI-1 is being submitted to MREC for Wales in December 2010 or January 2011

## Primary study design

Interventional

## Study design

Multicentre phase II/III interventional study

## Study type(s)

Treatment

## Health condition(s) or problem(s) studied

Acute myeloid leukemia (AML) patients over 60

## Interventions

The following treatments will be compared

1. Low dose Ara-C (cytarabine): 20 mg twice a day (b.i.d) by subcutaneous injection daily on days 1-10 (20 doses) to be repeated at 28 to 42 day intervals.
2. Sapacitabine: 300mg orally b.i.d. for 3 consecutive days in week one and in week two. This should be followed by a minimum of 4 weeks of no treatment. This comprises one course.
3. Vosaroxin: Intravenous infusion in a dose of 72mg/m<sup>2</sup> over 10 minutes on days 1 and 4 of each treatment course (two doses).
4. Low dose Ara-C + Vosaroxin: as above
5. Low dose Ara-C + AC220: Ara-C as above plus AC220 oral solution at allocated dose (135mg or 90mg or 60mg) once a day on an empty stomach at least 1 hour before or 2 hours after a meal in the morning for 21 consecutive days as 1 cycle of treatment.
6. 'Other novel agent'

Recruitment will proceed until at least 50 patients have entered each comparative arm (Ara-C and novel therapy). For treatments where the proposed effect is to improve survival by inducing a greater number of remissions, this component will then be analysed using complete remission as the measure.

Patients will be expected to receive four courses of treatment and are followed up annually for life.

### **Intervention Type**

Drug

### **Phase**

Phase II/III

### **Drug/device/biological/vaccine name(s)**

Ara-C (cytarabine), sapacitabine, vosaroxin, quizartinib (AC220), tosedostat (CHR-2797)

### **Primary outcome(s)**

1. Overall survival
2. Complete remission (CR + CRi) achievement and reasons for failure (for induction questions) assessed locally via bone marrow samples (as per standard care) after each course
3. Duration of response (CR, CRi) relapse rates and deaths in first CR
4. Toxicity, both haematological and non-haematological
5. Supportive care requirements (and other aspects of health economics)
6. Quality of Life Assessment

### **Key secondary outcome(s)**

1. Presence of a cytogenetic abnormality in the bone marrow of patients in morphological remission
2. Molecular characteristics and response to treatment

### **Completion date**

01/01/2020

## **Eligibility**

### **Key inclusion criteria**

1. Patients have one of the forms of acute myeloid leukaemia, except Acute Promyelocytic Leukaemia as defined by the WHO Classification (Appendix A) this can be any type of de novo or secondary AML or high risk Myelodysplastic Syndrome, defined as greater than 10% marrow blasts (RAEB-2)
2. Normally over the age of 60, but patients under this age are eligible if they are not considered fit for the NCRI AML16 trial or any subsequent equivalent trial
3. Written informed consent
4. For the AC220 interventions cardiac criteria must be met. Electrolyte levels of potassium, magnesium and calcium must be within the institutional normal range

### **Participant type(s)**

Patient

### **Healthy volunteers allowed**

No

### **Age group**

Senior

**Sex**

All

**Total final enrolment**

243

**Key exclusion criteria**

1. Patients have previously received cytotoxic chemotherapy for AML. (Hydroxycarbamide or similar low-dose therapy, to control the white count is not an exclusion criterion)
2. For AC220 treatment the following criteria make a patient ineligible for that randomisation:
  - 2.1. A myocardial infarction within 12 months
  - 2.2. Uncontrolled angina within 6 months
  - 2.3. Current or history of congestive heart failure New York Heart Association (NYHA) class 3 or 4, unless an echocardiogram (ECHO) or multiple gated acquisition scan (MUGA) performed either within 1 month prior to study screening or during screening results in a left ventricular ejection fraction (LVEF) that is  $\geq 45\%$  (or institutional lower limit of normal value)
  - 2.4. Diagnosed or suspected congenital long QT syndrome. Any history of clinically significant ventricular arrhythmias (such as ventricular tachycardia, ventricular fibrillation, torsades de pointes [TdP]) or any history of arrhythmia will be discussed with the clinical coordinator/safety physician prior to patients entry into the study
  - 2.5. Prolonged QTcF interval on pre-entry ECG ( $\geq 450$  ms)
  - 2.6. Any history of second or third degree heart block (may be eligible if the patient currently has a pacemaker)
  - 2.7. Heart rate  $< 50$ /minute on pre-entry ECG
  - 2.8. Uncontrolled hypertension
  - 2.9. Obligate need for a cardiac pacemaker
  - 2.10. Complete left bundle branch block
  - 2.11. Atrial fibrillation
3. In blast transformation of chronic myeloid leukaemia (CML)
4. Concurrent active malignancy under treatment
5. Pregnant or lactating
6. Acute Promyelocytic Leukaemia
7. Known infection with human immunodeficiency virus (HIV)

**Date of first enrolment**

01/04/2011

**Date of final enrolment**

01/01/2019

**Locations****Countries of recruitment**

United Kingdom

Wales

Australia

Denmark

France

**Study participating centre**  
**Department of Haematology,**  
Cardiff  
United Kingdom  
CF14 4XN

## Sponsor information

**Organisation**  
Cardiff University (UK)

**ROR**  
<https://ror.org/03kk7td41>

## Funder(s)

**Funder type**  
Other

**Funder Name**  
Leukaemia and Lymphoma Research (LLR) (UK)

**Alternative Name(s)**

**Funding Body Type**  
Private sector organisation

**Funding Body Subtype**  
Other non-profit organizations

**Location**  
United Kingdom

**Funder Name**  
Cardiff University (UK)

**Alternative Name(s)**  
PRIFYSGOL CAERDYD

## Funding Body Type

Private sector organisation

## Funding Body Subtype

Universities (academic only)

## Location

United Kingdom

# Results and Publications

## Individual participant data (IPD) sharing plan

### IPD sharing plan summary

Not provided at time of registration

### Study outputs

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
<a href="#">Results article</a>	Results for combination of low-dose ara-C plus tosedostat versus low-dose ara-C alone	01/07/2021	10/05/2021	Yes	No
<a href="#">Results article</a>	Results for combination of low-dose ara-C plus quizartinib versus low-dose ara-C alone	01/10/2021	04/10/2021	Yes	No
<a href="#">Study website</a>	Study website	11/11/2025	11/11/2025	No	Yes