

Thaw and Culture Details

Cell Line Name	UCSD216i-114-1							
WiCell Lot Number	WB66784							
Provider	University of California, San Diego – Dr. Kelly Frazer							
Banked By	WiCell							
Thaw and Culture Recommendations	WiCell recommends thawing 1 vial into 3 wells of a 6 well plate.							
Culture Platform	Feeder Independent							
	Medium: mTeSR™1							
	Matrix: Matrigel®							
Protocol WiCell Feeder Independent mTeSR™1 Protocol								
Passage Number	p21 These cells were cultured for 20 passages prior to freeze and post reprogramming. WiCell adds +1 to the passage number at freeze to best represent what the overall passage number of the cells at thaw. Plated cells at thaw should be labeled passage 21.							
Date Vialed	06-April-2018							
Vial Label	UCSD216i-114-1 p21 WB66784							
Biosafety and Use Information	Appropriate biosafety precautions should be followed when working with these cells. The end user is responsible for ensuring that the cells are handled and stored in an appropriate manner. WiCell is not responsible for damages or injuries that may result from the use of these cells. Cells distributed by WiCell are intended for research purposes only and are not intended for use in humans.							

Testing Performed by WiCell

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Test Description	Test Provider	Test Method	Test Specification	Result				
Karyotype by G-banding	anding WiCell SO		Expected karyotype	See Report				
Post-Thaw Viable Cell Recovery	WiCell	SOP-CH-305	SOP-CH-305 ≥ 15 Undifferentiated Colonies, ≤ 30% Differentiation and recoverable attachment after passage					
Identity by STR	UW Translational PowerPlex 16 HS Research Initiatives in System by Pathology Laboratory Promega		Defines profile	Pass				
Sterility	Steris	ST/07	Negative	Pass				
Mycoplasma	WiCell	SOP-QU-004	Negative	Pass				

Testing Reported by Provider

The Provider stated that some or all of the additional analyses listed below may have been performed for this cell line. For more information, publication and dbGaP links, where available, are provided on the cell line specific web page on the WiCell website.

- Illumina® HumanCoreExome BeadChip Array
- RNA-Seq
- Flow Cytometry (SSEA-4, Tra 1-81)
- Infinium® Expanded Multi-Ethnic Genotyping Array (MEGAEX)



Approval Date	Quality Assurance Approval		
07-August-2018	8/7/2018 X JKG WG Quality Assurance Signed by Gay, Jenna		



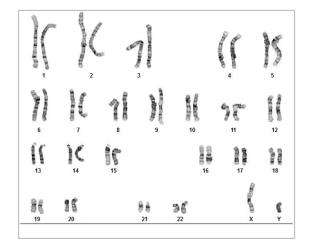
Chromosome Analysis Report: 071430

Date Reported: Friday, April 27, 2018 Cell Line: UCSD216i-114-1-WB66784 13657

Passage#: 21

Date of Sample: 4/20/2018 Specimen: Human IPS

Results: 46,XY



Cell Line Gender: Male

Reason for Testing: Lot release testing

Investigator:

Cell: 3

Slide: G02

Slide Type: Karyotype

Total Counted: 20 Total Analyzed: 8

Total Karyogrammed: 4 Band Resolution: 425 - 525

QC Review By: __

Interpretation:

This is a normal karyotype. No clonal abnormalities were detected at the stated band level of resolution.

Sent By:____ Sent To:_

Completed by:	, CG(ASCP)
Reviewed and Interpreted by:	, PhD, FACMGG

A signed copy of this report is available upon request.

Director of the WiCell Cytogenetics Laboratory.

Limitations: This assay allows for microscopic visualization of numerical and structural chromosome abnormalities. The size of structural abnormality that can be detected
is >3-10Mb, dependent upon the G-band resolution obtained from this specimen. For the purposes of this report, band level is defined as the number of G-bands per
haploid genome. It is documented here as "band level", i.e., the range of bands determined from the four karvograms in this assay. Detection of heterogeneity of clonal

cell populations in this specimen (i.e.,mosaicism) is limited by the number of metaphase cells examined, documented here as "# of cells counted". This assay was conducted solely for listed investigator/institution. The results may not be relied upon by any other party without the prior written consent of the Director of the WiCell Cytogenetics Laboratory. The results of this assay are for research use only. If the results of this assay are to be used for any other purpose, contact the

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Short Tandem Repeat Analysis

HISTOLOGY - IHC - MOLECULAR - IMAGING

Department of Pathology and Laboratory Medicine TRIP Laboratory (Molecular)

http://www.pathology.wisc.edu/research/trip

info@wicell.org (888) 204-1782

Sample Report:

13657-STR

Sample Name on Tube: 13657-STR

 $60.3 \text{ ng/}\mu\text{L}$, (A260/280=1.76)

Sample Type: Cells

Cell Count: ~2 million cells

Requestor:

WiCell Research Institute

Quality Department

Sample Date: N/A **Receive Date:** 04/30/18 **Assay Date:** 05/01/18

File Name: STR 180502 wmr

Report Date: 05/09/18

STR Locus	STR Locus STR Genotype Repeat #						
FGA	16–18,18.2,19,19.2,20,20.2,21,21.2,22, 22.2, 23, 23.2, 24, 24.2, 25, 25.2, 26–30, 31.2, 43.2, 44.2,45.2, 46.2	Identifying information has					
TPOX							
D8S1179	7-18	protect donor					
vWA	10-22	confidentiality. If					
Amelogenin	X,Y	more information					
Penta_D	2.2, 3.2, 5, 7-17	is required,					
CSF1PO	6-15	please, contact WiCell's Technical					
D16S539	68539 5, 8-15						
D7S820	6-14	Support.					
D13S317	7-15						
D5S818							
Penta_E							
D18S51	_						
D21S11							
TH01	4-9,9.3,10-11,13.3						
D3S1358	12-20						

Results: Based on the 13657-STR cells submitted by WiCell QA dated and received on 04/30/18, this sample (Label on Tube: 13657-STR) exactly matches the STR profile of the human stem cell line UCSD216i-114-1 comprising 29 allelic polymorphisms across the 15 STR loci analyzed.

Interpretation: No STR polymorphisms other than those corresponding to the human UCSD216i-114-1 stem cell line were detected and the concentration of DNA required to achieve an acceptable STR genotype (signal/ noise) was equivalent to that required for the standard procedure (~1 ng/amplification reaction) from human genomic DNA. This result suggests that the 13657-STR sample submitted corresponds to the UCSD216i-114-1 stem cell line and was not contaminated with any other human stem cells or a significant amount of mouse feeder layer cells.

Sensitivity: Sensitivity limits for detection of STR polymorphisms unique to either this or other human stem cell lines is $\sim 2-5\%$.

X WMR \mathbf{X} RMB 05/10/18 **Digitally Signed on** 05/10/18 **Digitally Signed on** PhD, Director / Co-Director TRIP Laboratory, Molecular UWHC Molecular Diagnostics Laboratory / UWSMPH TRIP Laboratory

Native Product Sterility Report



SAMPLE #:

18041158

DATE RECEIVED:

18-Apr-18

TEST INITIATED:

20-Apr-18

TEST COMPLETED:

04-May-18

SAMPLE NAME / DESCRIPTION:

JFRBi1 WB66746 13644

JFNY1 WB66747 13645

UCSD216i-114-1 WB66784 13646 PENN020i-588-6 DB36448 13647 PENN070i-408-1 DB35065 13648 PENN068i-697-3 DB36611 13649 PENN091i-588-2 DB35156 13650 PENN135i-30-8 DB34725 13651 STAN004i-147-1 WB66789 13652 STAN057i-162-1 WB66790 13653

UNIQUE IDENTIFIER:

NA

PRODUCT REGISTRATION:

Other: Human iPS cells

TEST RESULTS:

WiCell

504 S Rosa Rd, Rm 101

Madison, WI 53719

# Tested	# Positives (Growth)	- Control		
10	0	2 Negatives		

TEST SUMMARY:

# Samples	Media Type	Volume (mL)	Incubation Temperature (° C)	Incubation Duration (Days)
10	TSB	40	20 - 25	14
10	FTG	40	30 - 35	14

REFERENCE:

Processed according to LAB-003: Sterility Test Procedure

METHOD VALIDATION / PD #:

000053

TEST METHODOLOGY:

USP - Direct Transfer

COMMENTS:

"Reported as" per packing slip

REVIEWED BY

DATE D7MAY18

Specific test results may not be indicative of the characteristics of any other samples from the same lot or similar lots. This test report shall not be reproduced, except in full, without prior written approval. Liability is limited to the costs of the tests.



Mycoplasma Detection Assay Report Testing Performed by WiCell

Testing Performed by WiCell Lot Release Testing April 19, 2018 FORM SOP-QU-004.01 Version G Edition 02 Reported by: AP Reviewed by: DF BD Monolight 180

		Reading A		A	A Reading B		В	Ratio		
#	Sample Name	RLU1	RLU2	Ave	RLU1	RLU2	Ave	B/A	Result	Comments/Suggestions
1	UCSD216i-114-1-WB66784 13657	199	201	200	77	78	77.5	0.39	Negative	
2	Positive (+) Control	455	459	457	19756	20255	20006	43.78	Positive	
3	Negative (-) Control	674	728	701	87	86	86.5	0.12	Negative	

