

Electronic Supplementary Material

Journal of Genetic Counseling

Genetic information-seeking behaviors and knowledge among family members and patients with
Inherited Bone Marrow Failure Syndromes

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Online Resource 1.

Responses to measures of general and disorder-specific genetic knowledge among members of families with an IBMFS disorder

	True (%)	False (%)	Don't Know (%)
General Genetic Knowledge Scale Questions			
A. "We are all born with matched pairs of genes, one set from our mother and one set from our father"	76	8	16
B. "Genes are made up of DNA"	81	4	15
C. "Cells in different body organs have different genes in the nucleus"	22	33	45
D. "Mutations occur when the information carried by a gene is damaged in some way"	73	4	23
E. "Certain conditions in males can only be inherited from a mother and not from a father"	58	11	31
F. "Some genetic diseases occur when a child inherits two abnormal genes, one from each parent"	80	3	17
G. "A woman with breast cancer cannot have inherited the abnormal breast cancer gene from her father"	7	42	51
H. "If only males can get a certain disease (such as testicular cancer), then the alteration in DNA must have been inherited from the father"	9	44	47
I. "Some genetic diseases occur when a child inherits one copy of an abnormal gene from one parent"	67	10	23
J. "Mutations in different genes cannot cause the same disorder"	11	33	56
K. "Once a mutation for a disorder is identified in a person, the disorder can definitely be cured"	1	80	19
L. "A child shares more genes with a father or mother than with a sister or brother"	15	53	32
M. "A scientist can look at a person's chromosomes and tell if that person is male or female"	78	3	19
N. "An X-linked recessive genetic trait affects females more frequently than males"	16	30	54
O. "Carriers of mutations for autosomal recessive and X-linked recessive inherited conditions usually do not have the condition that affects other members of their families"	27	10	63
Diamond-Blackfan anemia Genetic Knowledge Scale			
A. "The most common inheritance pattern of DBA is autosomal dominant"	20	13	67
B. "The sex of the person with DBA may be an important clue in determining the inheritance pattern of DBA in their family"	10	43	48
C. "The RPS19 gene is one of the mutant genes in DBA"	76	0	24
D. "All of the children of a DBA gene carrier will have DBA"	0	81	19
E. "The physical features of a person with DBA indicate which specific DBA gene is abnormal"	7	54	38
F. "Knowing which family members are affected with	68	2	29

DBA may be helpful in determining the inheritance pattern in that particular family”

Dyskeratosis congenita Genetic Knowledge Scale

A. “The sex of a person with DC may be an important clue in determining the inheritance pattern of DC in their family”	45	13	42
B. “The gene called DKC1 is located on the X chromosome”	46	3	51
C. “All the children of a person who has a mutation in a DC gene will have DC”	3	55	42
D. “The physical features of a person with DC indicate which specific DC gene is abnormal”	11	37	52
E. “Knowing which specific family members are affected with DC may be helpful in determining the inheritance pattern in that particular family”	69	1	30

Fanconi Anemia Genetic Knowledge Scale

A. “The most common inheritance pattern of FA is autosomal dominant”	10	37	53
B. “The parents of a child with FA have a 75% chance (3 out of 4) of their next child not having FA”	60	23	17
C. “Knowledge of the ethnic background of a family may determine which specific FA gene is tested”	62	8	30
D. “All of the children of a carrier of FA will have FA”	3	87	10
E. “The physical features of a person with FA indicate which specific FA gene is abnormal”	6	62	33
F. “Knowledge of the FA patient’s complementation group determines the mutation test that will be performed”	43	8	49

Shwachman-Diamond syndrome Genetic Knowledge Scale

A. “The most common inheritance pattern of SD is autosomal dominant”	9	41	50
B. “The parents of a child with SD have a 75% chance (3 out of 4) of their next child not having SD”	59	22	19
C. “Knowledge of the ethnic background of a family may determine which specific SD gene is tested”	16	44	41
D. “All of the children of a carrier of SD will have SD”	3	88	9
E. “The physical features of a person with SD indicate which specific SD gene is abnormal”	6	75	19
F. “Knowing which family members are affected with SD may be helpful in determining the inheritance pattern in that particular family”	47	16	37

Note. Values for the correct answer are bolded for each question. DBA=Diamond-Blackfan anemia; DC=dyskeratosis congenita; FA=Fanconi anemia; SDS=Shwachman-Diamond syndrome.

Online Resource 2.

Websites visited by members of families with an IBMFS disorder to learn about the genetic condition in their family ($n = 141$)

Website	<i>n</i>
Disease-specific websites ($n = 103$)	
Fanconi Anemia Research Fund	44
Diamond Blackfan Anemia Foundation	13
DBA Yahoo Group	9
SDSF / SDSI	7
National Organization for Rare Disorders	6
diamondblackfananemia.org	5
Dyskeratosis Congenita Outreach	5
Diamond Blackfan Anemia Registry of North America	4
FA Yahoo Group	3
aamac.ca	1
Fanconi Canada	1
marrow.org	1
Raredisorders.com	1
Schwachman-Diamond Syndrome Canada	1
Shwachman-Diamond America	1
turnersyndrome.org	1
Government websites ($n = 57$)	
NIH	39
PubMed	9
NCI	5
marrowfailure.cancer.gov	2
CDC	1
OMIM	1
Medical search websites ($n = 47$)	
WebMD	31
eMedicine / Medscape	6
Medline	4
Genetics Home Reference	2
Patient.co.uk	2
caringbridge.org	1
medical-dictionary.com	1
Generic search websites ($n = 33$)	
Google	10
Wikipedia	10
Yahoo.com	5
Ask Jeeves	3
msn.com	3
iVillage.com	1
Search engines	1
Hospital and medical center websites ($n = 20$)	
Mayoclinic.com	9
Rockefeller.edu	3
bmt.umn.edu	2
cincinnatichildrens.org	2
Children's Medical Center	1
jeffersonhospital.org	1

penmedicine.org	1
Steven & Alexandra Cohen Children's Medical Center of New York	1
Other (industry/investigator/scientific literature) websites (n = 4)	
ambrygen.com	1
Arleen Auerbach's website	1
Blood journal	1
JAMA	1

Note. Of the 304 individual responses provided by participants, 13% could not be identified or categorized (e.g., "various websites", "Fanconi Anemia") and were excluded from this summary.