Normalisasi Database Aplikasi

emari

LB01 - AOL DATABASE

2602089793 - Kevyn Aprilyanto

2602089143 - Jonathan Alvindo Fernandi

2602101653 - Andrew Afonso Lie

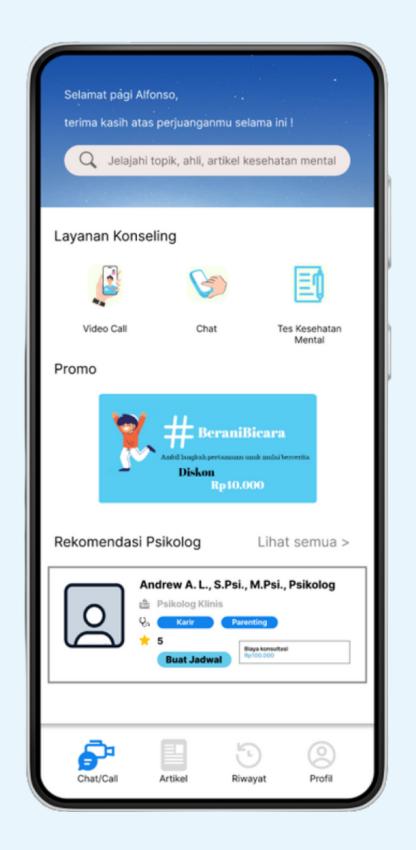


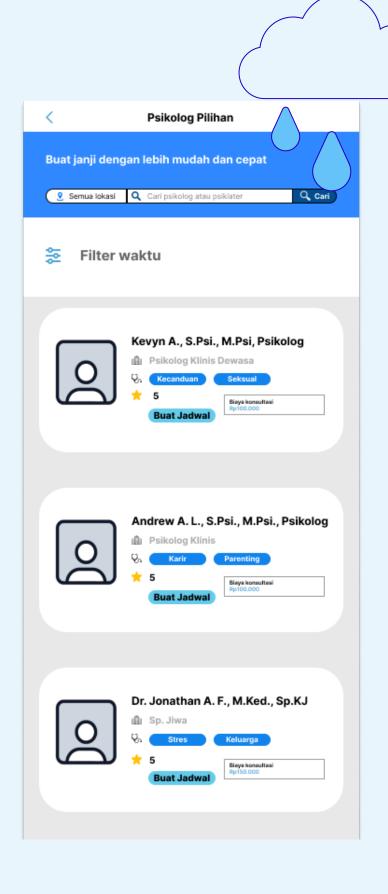
Apa itu emari?

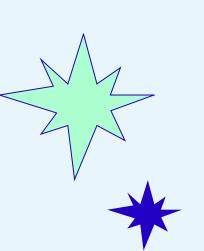
Jemari adalah aplikasi yang bertujuan membantu masyarakat dengan permasalahan mental untuk berkonsultasi dengan ahli atau sekadar memiliki teman cerita yang dapat mendengarkan dengan baik.

bit.ly/jemari-appinterface



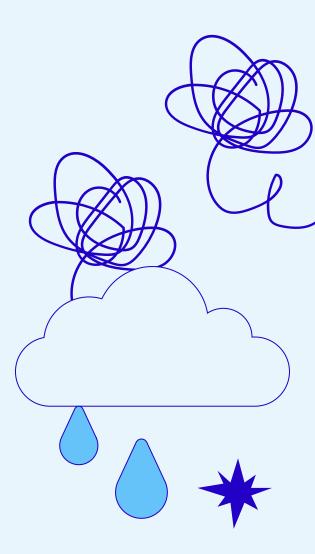






Latar Belakang

Persoalan masalah kesehatan mental menjadi soroton utama di tengah kehidupan masyarakat modern termasuk di Indonesia. Banyak sekali faktor yang dapat menyebabkan masalah ini seperti pekerjaan, tekanan sosial, pasangan atau bahkan orang tua sendiri. Pada tahun 2012 dan 2019, Organisasi Kesehatan Dunia (WHO) mengeluarkan pernyataan bahwa 450 juta orang di seluruh dunia menderita gangguan mental dimana 8 dari 10 penderita tersebut tidak mendapatkan perawatan dan 800 ribu orang meninggal per tahunnya akibat bunuh diri. Hal ini dikarenakan masih sedikit sarana yang efektif guna menyuarakan beban emosional & mencari bantuan para ahli. Ini menjadi penting karena kesehatan mental bukanlah sekedar urusan individual melainkan isu kesejahteraan masyarakat. Maka dari itu, dengan aplikasi Jemari, kesehatan mental menjadi kunci penting untuk membangun masyarakat yang sehat, inklusif dan berkelanjutan.



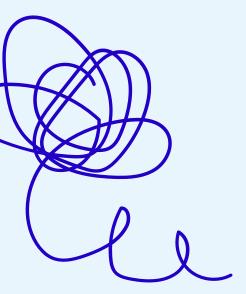
Kompas.com / Kompas.com / News & Features

WHO: 450 Juta Orang Menderita Gangguan Jiwa

Kompas.com - 10/10/201

Menurut WHO, 2019, sekitar 800.000 orang meninggal akibat bunuh diri per tahun, di dunia.

Angka bunuh diri lebih tinggi pada usia muda. Di Asia Tenggara, angka bunuh diri tertinggi terdapat di Thailand yaitu 12.9 (per 100.000 populasi), Singapura (7,9), Vietnam (7.0), Malaysia (6.2), Indonesia (3.7), dan Filipina (3.7).



SKENARIO

PERMASALAHAN

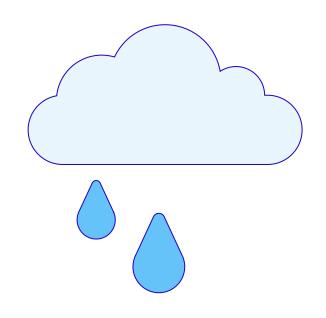
Vivi adalah seoarang siswa kelas 11 di sebuah sekolah. Beberapa hari ini, Vivi sering merasa gelisah dan ketakutan. Vivi merasa waktunya untuk mencari bantuan kepada para ahli, tetapi Vivi bingung ke mana dia harus mencari pertolongan.





SOLUSI

Vivi menemukan aplikasi Jemari untuk membantu masalah kesehatan mentalnya. Vivi kemudian mencari ahli atau sekedar teman curhat dan dapat berinteraksi dengan psikiater pilihannya. Kemudian ia diberikan diagnosis yang tercatat pada aplikasi.



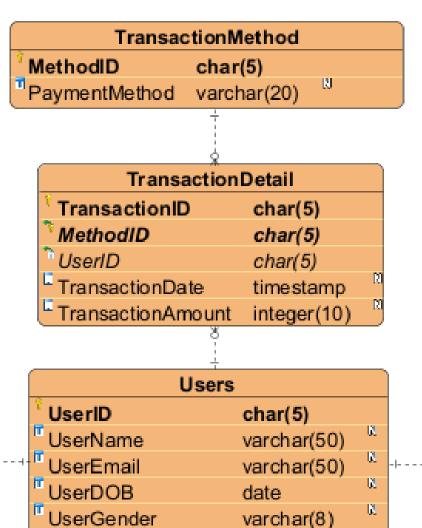
Sessions

SessionType varchar(20)

char(5)

MessageID





UserPhoneNumber

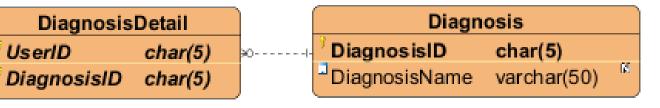
CounselorID

UserID

CounselorTypeID

CounselorName

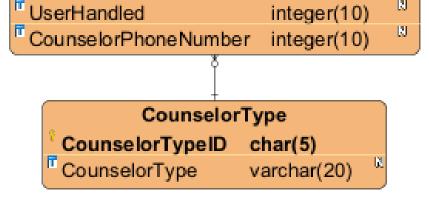
YearOfExperience



DiagnosisDetail

UserID

ERD (ENTITY-RELATIONSHIP DIAGRAM)



Counselors

integer(10)

char(5)

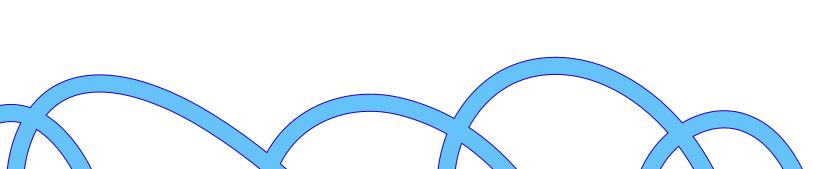
char(5)

char(5)

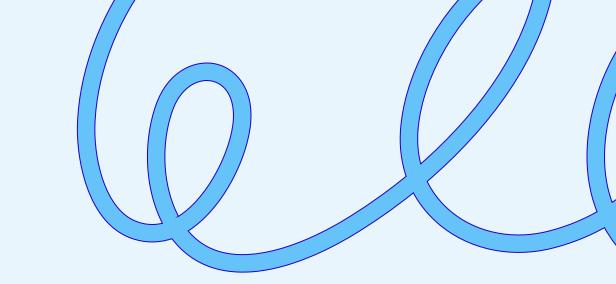
varchar(50)

integer(10)





ANOMALY DATA



INSERT

Insert terjadi ketika suatu informasi baru ditambahkan sementara data-data lainnya belum ada. Pada aplikasi JEMARI, data pasien baru, yaitu nama, jenis kelamin, tanggal lahir, dan nomor telepon dimasukkan.

UPDATE

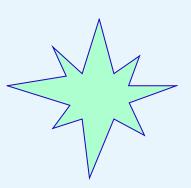
Update terjadi ketika
pembaruan satu informasi
memerlukan pembaruan
di banyak tempat. Pada aplikasi
JEMARI, ketika 1 pengguna
berkonsultasi dengan banyak
konselor ataupun sebaliknya,
dan namanya terduplikasi maka
jika mengubah namanya, semua
data menjadi tidak valid.

DELETE

Delete terjadi ketika
penghapusan informasi
berakibat pada kehilangan
informasi lain yang tidak
direncanakan. Pada aplikasi
JEMARI, jika ingin
menghapus data pasien maka
akan sekaligus kehilangan data
konselor yang
menanganinya.



IMPLEMENTASI NORMALISASI DATA

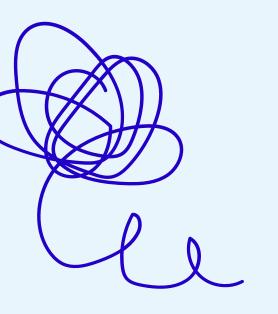




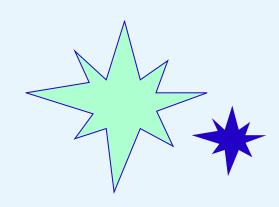
Unnormalized Form

First Normal Form Second Normal Form Third Normal Form

Boyce-Codd Normal Form

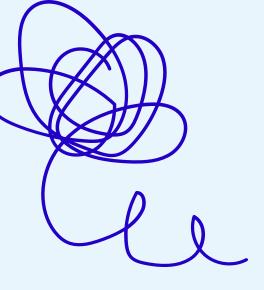




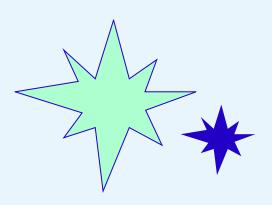


UNF (Unnormalized Form)

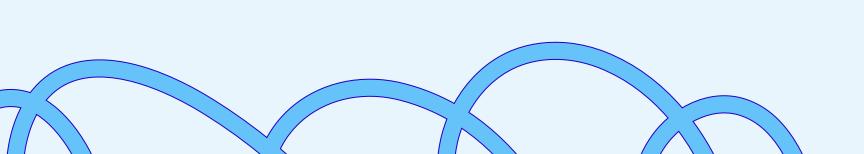
Unnormalized Form (UNF) adalah bentuk tak normal berdasarkan data yang diperoleh langsung. Bentuk ini biasanya masih mengandung redundansi data. Kumpulan data yang direkam tidak harus mengikuti format tertentu, sehingga data bisa saja tidak lengkap atau terduplikas

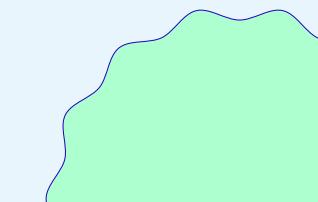


UNF (Unnormalized Form)



User Name	User Email	User Date Of Birth	User Gender	User Phone Number	Session Date	Session Duration	SessionsType
			<u> </u>				
Siwon Choi	siwon.choi@gmail.com	15/06/2000	Male	082137894589	13/01/2023	90 minutes	Video Call
Karin Salensia	karin.salensia@gmail.com	20/11/2001	Female	082198766789	15/01/2023	50 minutes	Message
Rea Angeline	rea.angeline@gmail.com	29/07/1999	Female	082134566543	20/01/2023	120 minutes	Video Call
Vivi Silvi	vivi.silvi@gmail.com	21/09/1988	Female	082187655678	11/02/2023	77 minutes	Message
Christina Imanuel	christina.imanuel@gmail.com	09/12/1998	Female	082197421357	15/02/2023	24 minutes	Message
Jessica Faustin	jessica.faustin@gmail.com	12/01/2002	Female	082136996384	27/02/2023	39 minutes	Message
Lendra Vinci	ruby.sandro@gmail.com	03/07/1991	Male	082187665890	20/03/2023	49 minutes	Video Call
Caroline Leota	caroline.leota@gmail.com	11/04/2001	Female	082177663890	30/03/2023	83 minutes	Video Call
Jesslyn Miracle	jesslyn.miracle@gmail.com	26/04/2004	Female	082184899217	13/04/2023	111 minutes	Message
Stefani Luna	stefani.luna@gmail.com	20/03/1992	Female	082187549972	24/04/2023	69 minutes	Video Call
Vicenzo Nicholas	vicenzo.nicholas@gmail.com	19/01/2003	Male	082138909983	13/05/2023	101 minutes	Message
Nickson Alfredo	nickson.alfredo@gmail.com	08/08/2008	Male	082120897932	10/06/2023	70 mintes	Message
Alexander Imanuel	alexander.imanuel@gmail.com	09/03/2005	Male	081221020816	28/06/2023	97 minutes	Message
Nadia Cristabela	nadia.cristabela@gmail.com	14/03/1987	Female	081233789978	19/07/2023	88 minutes	Message
Cindy Serfena	cindy.serfena@gmail.com	17/07/2006	Female	081938393925	21/07/2023	15 minutes	Video Call





UNF (Unormalized Form)

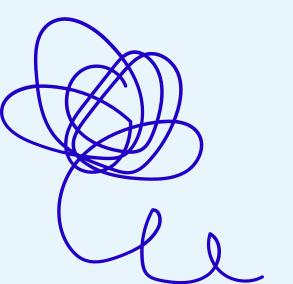


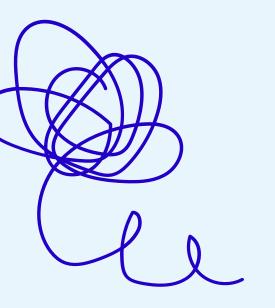
Table 1.1

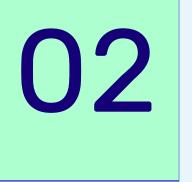
Diagnos Name	Counselor Name	Counselor Type	Counselor Year Of Experience	Counselor User Handled	Counselor Phone Number	Transaction Date
Depression	Johnson	Psychiatrist	20	120	082137894589	13/01/2023-14.00
Axienty Disorder	Johnson	Psychiatrist	20	121	082137894589	15/01/2023-18-19
Bipolar Disorder						
Schizophrenia	Robert	Psychiatrist	10	24	082177986273	20/01/2023-11.2 5
ADHD	William	Psychology Student	0	10	082141479982	11/02/2023-09.50
Panic Disorder	William	Psychology Student	0	11	082141479982	15/02/2023-20.05
Axienty Disorder	Vincent	Psychology Student	0	30	082198907654	27/02/2023-08.45
Axienty Disorder	Robert	Psychiatrist	10	57	082177986273	20/03/2023-15.59
Depression	Johnson	Psychiatrist	20	122	082137894589	30/03/2023-13.35
Depression	Amelia	Psychology Student	2	5	082165781243	13/04/2023-12.55
ADHD	Robert	Psychiatrist	10	26	082177986273	24/04/2023-17.33
Panic Disorder	Jesslyn	Psychiatrist	7	72	082123072004	13/05/2023-22.13
Schizophernia	Jesslyn	Psychiatrist	7	73	082123072004	10/06/2023-19.35
ADHD	William	Psychology Student	0	12	082141479982	28/06/2023-10.46
Panic Disorder	Johnson	Psychiatrist	3	123	082137894589	19/07/2023-11.50
Axienty Disorder	Amelia	Psychology Student	0	6	082165781243	21/07/2023-17.30

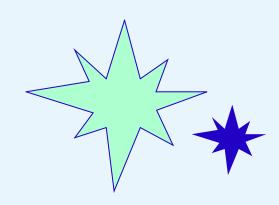
Table	1.2
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Trans	action Amount	Payment Method
Rp	525.000,00	Bank BCA
Rp	450.000,00	Bank MANDIRI
Rp	976.200,00	BANK BCA
Rp	475.000,00	BANK BRI
Rp	390.000,00	BANK BRI
Rp	432.000,00	GOPAY
Rp	555.000,00	BANK BCA
Rp	565.000,00	DANA
Rp	854.500,00	DANA
Rp	485.000,00	Bank MANDIRI
Rp	765.000,00	BANK BCA
Rp	485.000,00	GOPAY
Rp	695.000,00	BANK BCA
Rp	345.000,00	BANK MANDIRI
Rp	250.000,00	BANK BRI





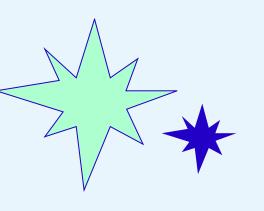




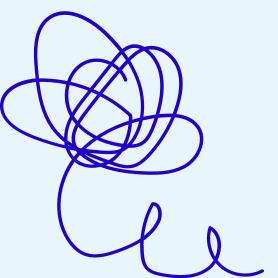
1NF (First Normal Form)

First Normal Form (1NF) adalah tahapan ketika beberapa group elemen yang berulang dihilangkan agar menjadi satu harga tunggal dan setiap atribut harus bersifat atomic value. Syarat 1NF adalah setiap baris harus berisi single value, tidak ada data terduplikasi, tidak ada kolom dengan atribut/domain yang sama, dan memiliki 1 primary key.

1NF (First Normal Form)



UserID	Counselor Type ID	DiagnosisID	MessageID	MethodID	User Name	User Email
UD001	CT001	DG001	MD001	MT001	Siwon Choi	siwon.choi@gmail.com
UD002	CT001	DG002	MD002	MT002	Karin Salensia	karin.salensia@gmail.com
UD003	CT001	DG003	MD001	MT001	Rea Angeline	rea.angeline@gmail.com
UD003	CT001	DG004	MD001	MT001	Rea Angeline	rea.angeline@gmail.com
UD004	CT002	DG005	MD002	MT003	Vivi Silvi	<u>vivi.silvi@gmail.com</u>
UD005	CT002	DG006	MD002	MT003	Christina Imanuel	christina.imanuel@gmail.com
UD006	CT002	DG002	MD002	MT004	Jessica Faustin	jessica.faustin@gmail.com
UD007	CT001	DG002	MD001	MT001	Lendra Vinci	ruby.sandro@gmail.com
UD008	CT001	DG001	MD001	MT005	Caroline Leota	caroline.leota@gmail.com
UD009	CT002	DG001	MD002	MT005	Jesslyn Miracle	jesslyn.miracle@gmail.com
UD010	CT001	DG005	MD001	MT002	Stefani Luna	stefani.luna@gmail.com
UD011	CT001	DG006	MD002	MT001	Vicenzo Nicholas	vicenzo.nicholas@gmail.com
UD012	CT001	DG004	MD002	MT004	Nickson Alfredo	nickson.alfredo@gmail.com
UD013	CT002	DG005	MD002	MT001	Alexander Imanuel	alexander.imanuel@gmail.com
UD014	CT001	DG006	MD002	MT002	Nadia Cristabela	nadia.cristabela@gmail.com
UD015	CT002	DG003	MD001	MT003	Cindy Serfena	cindy.serfena@gmail.com





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		-

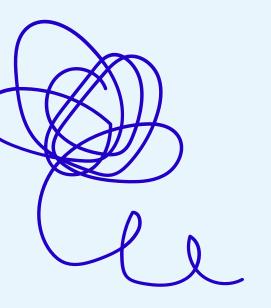
User Date Of Birth	User Gender	User Phone Number	SessionID	Session Date	Session Duration	SessionsType
15/06/2000	Male	082137894589	SD001	13/01/2023	90 minutes	Video Call
20/11/2001	Female	082198766789	SD002	15/01/2023	50 minutes	Message
29/07/1999	Female	082134566543	SD003	20/01/2023	120 minutes	Video Call
29/07/1999	Female	082134566543	SD003	20/01/2023	120 minutes	Video Call
21/09/1988	Female	082187655678	SD004	11/02/2023	77 minutes	Message
09/12/1998	Female	082197421357	SD005	15/02/2023	24 minutes	Message
12/01/2002	Female	082136996384	SD006	27/02/2023	39 minutes	Message
03/07/1991	Male	082187665890	SD007	20/03/2023	49 minutes	Video Call
11/04/2001	Female	082177663890	SD008	30/03/2023	83 minutes	Video Call
26/04/2004	Female	082184899217	SD009	13/04/2023	111 minutes	Message
20/03/1992	Female	082187549972	SD010	24/04/2023	69 minutes	Video Call
19/01/2003	Male	082138909983	SD011	13/05/2023	101 minutes	Message
08/08/2008	Male	082120897932	SD012	10/06/2023	70 mintes	Message
09/03/2005	Male	081221020816	SD013	28/06/2023	97 minutes	Message
14/03/1987	Female	081233789978	SD014	19/07/2023	88 minutes	Message
17/07/2006	Female	081938393925	SD015	21/07/2023	15 minutes	Video Call

Table 1.2

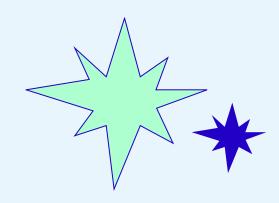
Diagnos Name	CounselorID	Counselor Name	Counselor Type	Counselor Year Of Experience	Counselor User Handled	Counselor Phone Number
Depression	CD001	Johnson	Psychiatrist	20	120	082137894589
Axienty Disorder	CD001	Johnson	Psychiatrist	20	121	082137894589
Bipolar Disorder	CD002	Robert	Psychiatrist	10	24	082177986273
Schizophrenia	CD002	Robert	Psychiatrist	10	24	082177986273
ADHD	CD003	William	Psychology Student	0	10	082141479982
Panic Disorder	CD003	William	Psychology Student	0	11	082141479982
Axienty Disorder	CD004	Vincent	Psychology Student	0	30	082198907654
Axienty Disorder	CD002	Robert	Psychiatrist	10	57	082177986273
Depression	CD001	Johnson	Psychiatrist	20	122	082137894589
Depression	CD005	Amelia	Psychology Student	2	5	082165781243
ADHD	CD002	Robert	Psychiatrist	10	26	082177986273
Panic Disorder	CD006	Jesslyn	Psychiatrist	7	72	082123072004
Schizophernia	CD006	Jesslyn	Psychiatrist	7	73	082123072004
ADHD	CD003	William	Psychology Student	0	12	082141479982
Panic Disorder	CD001	Johnson	Psychiatrist	3	123	082137894589
Bipolar Disorder	CD005	Amelia	Psychology Student	0	6	082165781243

TransactionID	Transaction Date	Tra	nsaction Amount	Payment Method
TD001	13/01/2023-14.00	Rp	525.000,00	Bank BCA
TD002	15/01/2023-18-19	Rp	450.000,00	Bank MANDIRI
TD003	20/01/2023-11.2 5	Rp	976.200,00	BANK BCA
TD003	20/01/2023-11.2 5	Rp	976.200,00	BANK BCA
TD004	11/02/2023-09.50	Rp	475.000,00	BANK BRI
TD005	15/02/2023-20.05	Rp	390.000,00	BANK BRI
TD006	27/02/2023-08.45	Rp	432.000,00	GOPAY
TD007	20/03/2023-15.59	Rp	555.000,00	BANK BCA
TD008	30/03/2023-13.35	Rp	565.000,00	DANA
TD009	13/04/2023-12.55	Rp	854.500,00	DANA
TD010	24/04/2023-17.33	Rp	485.000,00	Bank MANDIRI
TD011	13/05/2023-22.13	Rp	765.000,00	BANK BCA
TD012	10/06/2023-19.35	Rp	485.000,00	GOPAY
TD013	28/06/2023-10.46	Rp	695.000,00	BANK BCA
TD014	19/07/2023-11.50	Rp	345.000,00	BANK MANDIRI
TD015	21/07/2023-17.30	Rp	250.000,00	BANK BRI









2NF (Second Normal Form)

Second Normal Form (2NF) adalah tahap di mana atribut non-primary key hanya tergantung pada full primary key.

2NF didasari atas konsep full functional dependency.

Syarat 2NF adalah sudah dalam bentuk 1NF dan atribut bukan kunci harus memiliki ketergantungan fungsional sepenuhnya terhadap primary key.

2NF (Second Normal Form)

UserID	User Name	User Email	User Date Of Birth	User Gender	User Phone Number
UD001	Siwon Choi	siwon.choi@gmail.com	15/06/2000	Male	082137894589
UD002	Karin Salensia	karin.salensia@gmail.com	20/11/2001	Female	082198766789
UD003	Rea Angeline	rea.angeline@gmail.com	29/07/1999	Female	082134566543
UD003	Rea Angeline	rea.angeline@gmail.com	29/07/1999	Female	082134566543
UD004	Vivi Silvi	<u>vivi.silvi@gmail.com</u>	21/09/1988	Female	082187655678
UD005	Christina Imanuel	christina.imanuel@gmail.com	09/12/1998	Female	082197421357
UD006	Jessica Faustin	jessica.faustin@gmail.com	12/01/2002	Female	082136996384
UD007	Lendra Vinci	ruby.sandro@gmail.com	03/07/1991	Male	082187665890
UD008	Caroline Leota	caroline.leota@gmail.com	11/04/2001	Female	082177663890
UD009	Jesslyn Miracle	jesslyn.miracle@gmail.com	26/04/2004	Female	082184899217
UD010	Stefani Luna	stefani.luna@gmail.com	20/03/1992	Female	082187549972
UD011	Vicenzo Nicholas	vicenzo.nicholas@gmail.com	19/01/2003	Male	082138909983
UD012	Nickson Alfredo	nickson.alfredo@gmail.com	08/08/2008	Male	082120897932
UD013	Alexander Imanuel	alexander.imanuel@gmail.com	09/03/2005	Male	081221020816

14/03/1987

17/07/2006

Female

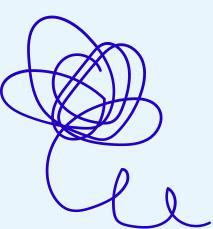
Female

081233789978

081938393925

nadia.cristabela@gmail.com

cindy.serfena@gmail.com



UD014

UD015

Nadia Cristabela

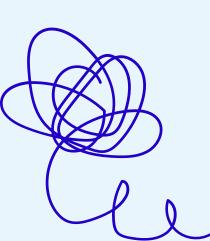
Cindy Serfena

CounselorID	CounselorTypeID	UserID	Counselor Name	Counselor Type	Counselor Year Of Experience
CD001	CT001	UD001	Johnson	Psychiatrist	20
CD001	CT001	UD002	Johnson	Psychiatrist	20
CD002	CT001	UD003	Robert	Psychiatrist	10
CD002	CT001	UD003	Robert	Psychiatrist	10
CD003	CT002	UD004	William	Psychology Student	0
CD003	CT002	UD005	William	Psychology Student	0
CD004	CT002	UD006	Vincent	Psychology Student	0
CD002	CT001	UD007	Robert	Psychiatrist	10
CD001	CT001	UD008	Johnson	Psychiatrist	20
CD005	CT002	UD009	Amelia	Psychology Student	2
CD002	CT001	UD010	Robert	Psychiatrist	10
CD006	CT001	UD011	Jesslyn	Psychiatrist	7
CD006	CT001	UD012	Jesslyn	Psychiatrist	7
CD003	CT002	UD013	William	Psychology Student	0
CD001	CT001	UD014	Johnson	Psychiatrist	3
CD005	CT002	UD015	Amelia	Psychology Student	0

Table 2.1

ODOIS AIII	lena Tayonology Stud
Counselor User Handled	Counselor Phone Number
120	082137894589
121	082137894589
24	082177986273
24	082177986273
10	082141479982
11	082141479982
30	082198907654
57	082177986273
122	082137894589
5	082165781243
26	082177986273
72	082123072004
73	082123072004
12	082141479982
123	082137894589
6	082165781243

Table 2.2

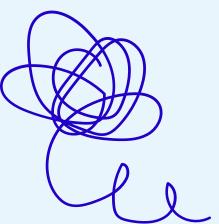


TransactionID	MethodID	UserID	Transaction Date	Transaction Amount	Payment Method
TD001	MT001	UD001	13/01/2023-14.00	Rp 525.000,00	Bank BCA
TD002	MT002	UD002	15/01/2023-18-19	Rp 450.000,00	Bank MANDIRI
TD003	MT001	UD003	20/01/2023-11.2 5	Rp 976.200,00	BANK BCA
TD003	MT001	UD003	20/01/2023-11.2 5	Rp 976.200,00	BANK BCA
TD004	MT003	UD004	11/02/2023-09.50	Rp 475.000,00	BANK BRI
TD005	MT003	UD005	15/02/2023-20.05	Rp 390.000,00	BANK BRI
TD006	MT004	UD006	27/02/2023-08.45	Rp 432.000,00	GOPAY
TD007	MT001	UD007	20/03/2023-15.59	Rp 555.000,00	BANK BCA
TD008	MT005	UD008	30/03/2023-13.35	Rp 565.000,00	DANA
TD009	MT005	UD009	13/04/2023-12.55	Rp 854.500,00	DANA
TD010	MT002	UD010	24/04/2023-17.33	Rp 485.000,00	Bank MANDIRI
TD011	MT001	UD011	13/05/2023-22.13	Rp 765.000,00	BANK BCA
TD012	MT004	UD012	10/06/2023-19.35	Rp 485.000,00	GOPAY
TD013	MT001	UD013	28/06/2023-10.46	Rp 695.000,00	BANK BCA
TD014	MT002	UD014	19/07/2023-11.50	Rp 345.000,00	BANK MANDIRI
TD015	MT003	UD015	21/07/2023-17.30	Rp 250.000,00	BANK BRI

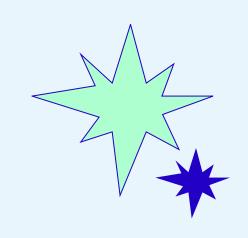
Table 2.1

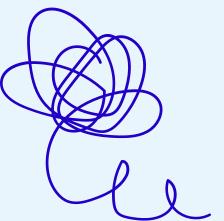
<u>L</u>						
	SessionsType	Session Duration	Session Date	UserID	MessageID	SessionID
T	Video Call	90 minutes	13/01/2023	UD001	MD001	SD001
	Message	50 minutes	15/01/2023	UD002	MD002	SD002
	Video Call	120 minutes	20/01/2023	UD003	MD001	SD003
	Video Call	120 minutes	20/01/2023	UD003	MD001	SD003
	Message	77 minutes	11/02/2023	UD004	MD002	SD004
	Message	24 minutes	15/02/2023	UD005	MD002	SD005
	Message	39 minutes	27/02/2023	UD006	MD002	SD006
	Video Call	49 minutes	20/03/2023	UD007	MD001	SD007
	Video Call	83 minutes	30/03/2023	UD008	MD001	SD008
	Message	111 minutes	13/04/2023	UD009	MD002	SD009
	Video Call	69 minutes	24/04/2023	UD010	MD001	SD010
	Message	101 minutes	13/05/2023	UD011	MD002	SD011
	Message	70 mintes	10/06/2023	UD012	MD002	SD012
	Message	97 minutes	28/06/2023	UD013	MD002	SD013
	Message	88 minutes	19/07/2023	UD014	MD002	SD014
	Video Call	15 minutes	21/07/2023	UD015	MD001	SD015

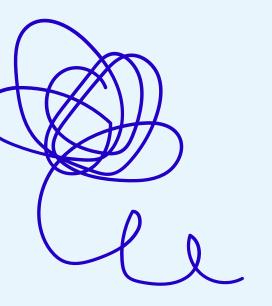
Table 2.2



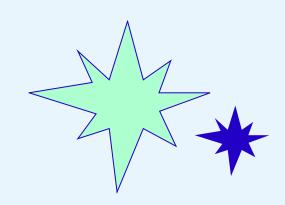
UserID	DiagnosisID	Diagnos Name
UD001	DG001	Depression
UD002	DG002	Axienty Disorder
UD003	DG003	Bipolar Disorder
UD003	DG004	Schizophrenia
UD004	DG005	ADHD
UD005	DG006	Panic Disorder
UD006	DG002	Axienty Disorder
UD007	DG002	Axienty Disorder
UD008	DG001	Depression
UD009	DG001	Depression
UD010	DG005	ADHD
UD011	DG006	Panic Disorder
UD012	DG004	Schizophernia
UD013	DG005	ADHD
UD014	DG006	Panic Disorder
UD015	DG003	Bipolar Disorder





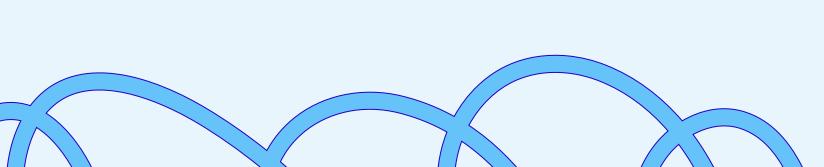




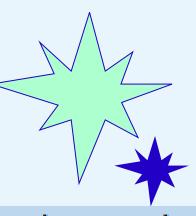


3NF (Third Normal Form)

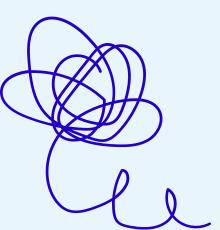
Third Normal Form (3NF) adalah tahap normalisasi yang menghilangkan transitive dependency. Syarat 3NF adalah harus dalam bentuk 2NF terlebih dahulu dan atribut yang bukan kunci haruslah tidak memiliki ketergantungan secara transitif terhadap atribut bukan kunci lainnya.



3NF (Third Normal Form)



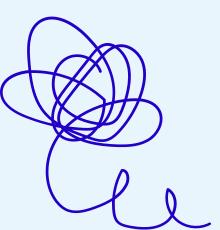
UserID	User Name	User Email	User Date Of Birth	User Gender	User Phone Number
UD001	Siwon Choi	siwon.choi@gmail.com	15/06/2000	Male	082137894589
UD002	Karin Salensia	karin.salensia@gmail.com	20/11/2001	Female	082198766789
UD003	Rea Angeline	rea.angeline@gmail.com	29/07/1999	Female	082134566543
UD003	Rea Angeline	rea.angeline@gmail.com	29/07/1999	Female	082134566543
UD004	Vivi Silvi	vivi.silvi@gmail.com	21/09/1988	Female	082187655678
UD005	Christina Imanuel	christina.imanuel@gmail.com	09/12/1998	Female	082197421357
UD006	Jessica Faustin	jessica.faustin@gmail.com	12/01/2002	Female	082136996384
UD007	Lendra Vinci	ruby.sandro@gmail.com	03/07/1991	Male	082187665890
UD008	Caroline Leota	caroline.leota@gmail.com	11/04/2001	Female	082177663890
UD009	Jesslyn Miracle	jesslyn.miracle@gmail.com	26/04/2004	Female	082184899217
UD010	Stefani Luna	stefani.luna@gmail.com	20/03/1992	Female	082187549972
UD011	Vicenzo Nicholas	vicenzo.nicholas@gmail.com	19/01/2003	Male	082138909983
UD012	Nickson Alfredo	nickson.alfredo@gmail.com	08/08/2008	Male	082120897932
UD013	Alexander Imanuel	alexander.imanuel@gmail.com	09/03/2005	Male	081221020816
UD014	Nadia Cristabela	nadia.cristabela@gmail.com	14/03/1987	Female	081233789978
UD015	Cindy Serfena	cindy.serfena@gmail.com	17/07/2006	Female	081938393925

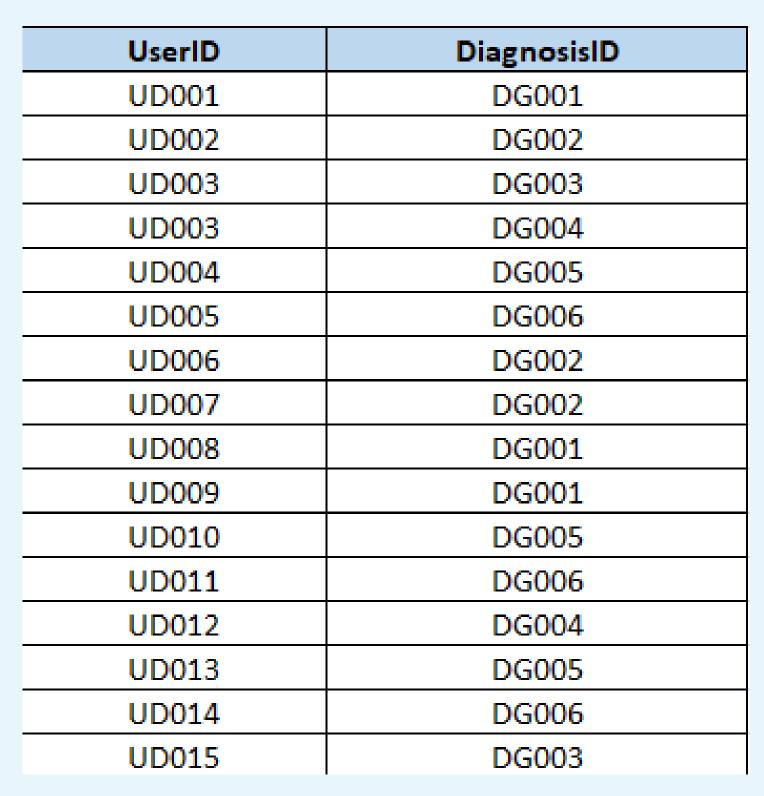


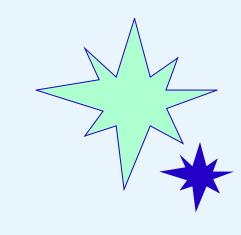


CounselorID	CounselorTypeID	UserID	Counselor Name	Counselor Year Of Experience	Counselor User Handled	Counselor Phone Number
CD001	CT001	UD001	Johnson	20	120	082137894589
CD001	CT001	UD002	Johnson	20	121	082137894589
CD002	CT001	UD003	Robert	10	24	082177986273
CD002	CT001	UD003	Robert	10	24	082177986273
CD003	CT002	UD004	William	0	10	082141479982
CD003	CT002	UD005	William	0	11	082141479982
CD004	CT002	UD006	Vincent	0	30	082198907654
CD002	CT001	UD007	Robert	10	57	082177986273
CD001	CT001	UD008	Johnson	20	122	082137894589
CD005	CT002	UD009	Amelia	2	5	082165781243
CD002	CT001	UD010	Robert	10	26	082177986273
CD006	CT001	UD011	Jesslyn	7	72	082123072004
CD006	CT001	UD012	Jesslyn	7	73	082123072004
CD003	CT002	UD013	William	0	12	082141479982
CD001	CT001	UD014	Johnson	3	123	082137894589
CD005	CT002	UD015	Amelia	0	6	082165781243

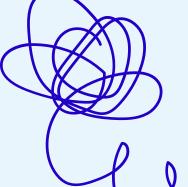
CounselorTypeID	Counselor Type
CT001	Psychiatrist
CT002	Psychology Student







DiagnosisID	Diagnos Name
DG001	Depression
DG002	Axienty Disorder
DG003	Bipolar Disorder
DG004	Schizophrenia
DG005	ADHD
DG006	Panic Disorder



TransactionID	MethodID	UserID	Transaction Date	Transaction Amount
TD001	MT001	UD001	13/01/2023-14.00	Rp 525.000,00
TD002	MT002	UD002	15/01/2023-18-19	Rp 450.000,00
TD003	MT001	UD003	20/01/2023-11.2 5	Rp 976.200,00
TD003	MT001	UD003	20/01/2023-11.2 5	Rp 976.200,00
TD004	MT003	UD004	11/02/2023-09.50	Rp 475.000,00
TD005	MT003	UD005	15/02/2023-20.05	Rp 390.000,00
TD006	MT004	UD006	27/02/2023-08.45	Rp 432.000,00
TD007	MT001	UD007	20/03/2023-15.59	Rp 555.000,00
TD008	MT005	UD008	30/03/2023-13.35	Rp 565.000,00
TD009	MT005	UD009	13/04/2023-12.55	Rp 854.500,00
TD010	MT002	UD010	24/04/2023-17.33	Rp 485.000,00
TD011	MT001	UD011	13/05/2023-22.13	Rp 765.000,00
TD012	MT004	UD012	10/06/2023-19.35	Rp 485.000,00
TD013	MT001	UD013	28/06/2023-10.46	Rp 695.000,00
TD014	MT002	UD014	19/07/2023-11.50	Rp 345.000,00
TD015	MT003	UD015	21/07/2023-17.30	Rp 250.000,00

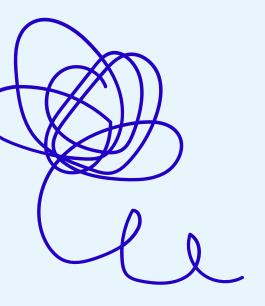
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MethodID	Payment Method
MT001	Bank BCA
MT002	Bank MANDIRI
MT003	BANK BRI
MT004	GOPAY
MT005	DANA

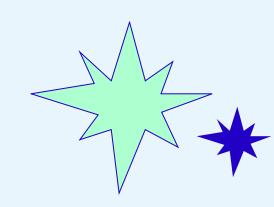
SessionID	MessageID	UserID	Session Date	Session Duration
SD001	MD001	UD001	13/01/2023	90 minutes
SD002	MD002	UD002	15/01/2023	50 minutes
SD003	MD001	UD003	20/01/2023	120 minutes
SD003	MD001	UD003	20/01/2023	120 minutes
SD004	MD002	UD004	11/02/2023	77 minutes
SD005	MD002	UD005	15/02/2023	24 minutes
SD006	MD002	UD006	27/02/2023	39 minutes
SD007	MD001	UD007	20/03/2023	49 minutes
SD008	MD001	UD008	30/03/2023	83 minutes
SD009	MD002	UD009	13/04/2023	111 minutes
SD010	MD001	UD010	24/04/2023	69 minutes
SD011	MD002	UD011	13/05/2023	101 minutes
SD012	MD002	UD012	10/06/2023	70 mintes
SD013	MD002	UD013	28/06/2023	97 minutes
SD014	MD002	UD014	19/07/2023	88 minutes
SD015	MD001	UD015	21/07/2023	15 minutes

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) N

MessageID	SessionsType
MD001	Video Call
MD002	Message

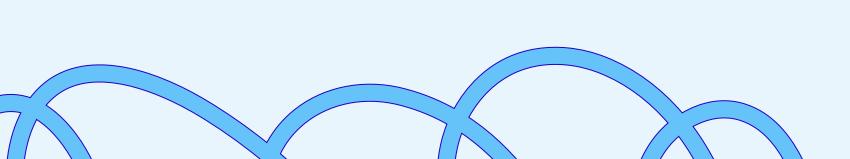


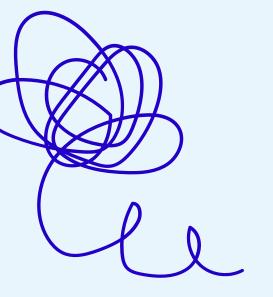


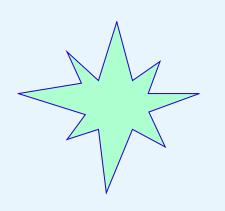


BCNF (Boyce-Codd Normal Form)

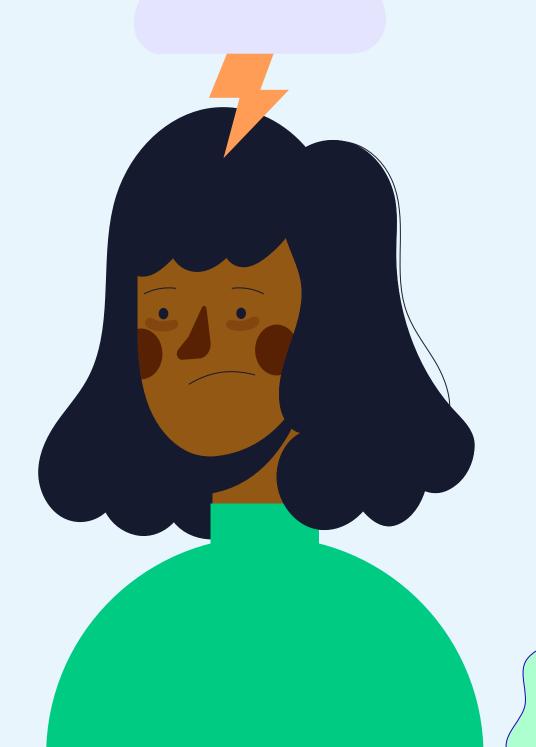
Suatu relasi dikatakan dalam BCNF jika setiap dependensi fungsional non-trivial (X -> Y) memenuhi syarat bahwa X adalah superkey. Ini berarti bahwa tidak ada dependensi fungsional di mana atribut non-key menentukan atribut lain yang juga merupakan non-key. Hal ini meningkatkan integritas data dan mengurangi redundansi dalam struktur basis data.







04 SARAN emari

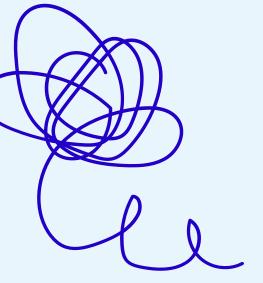




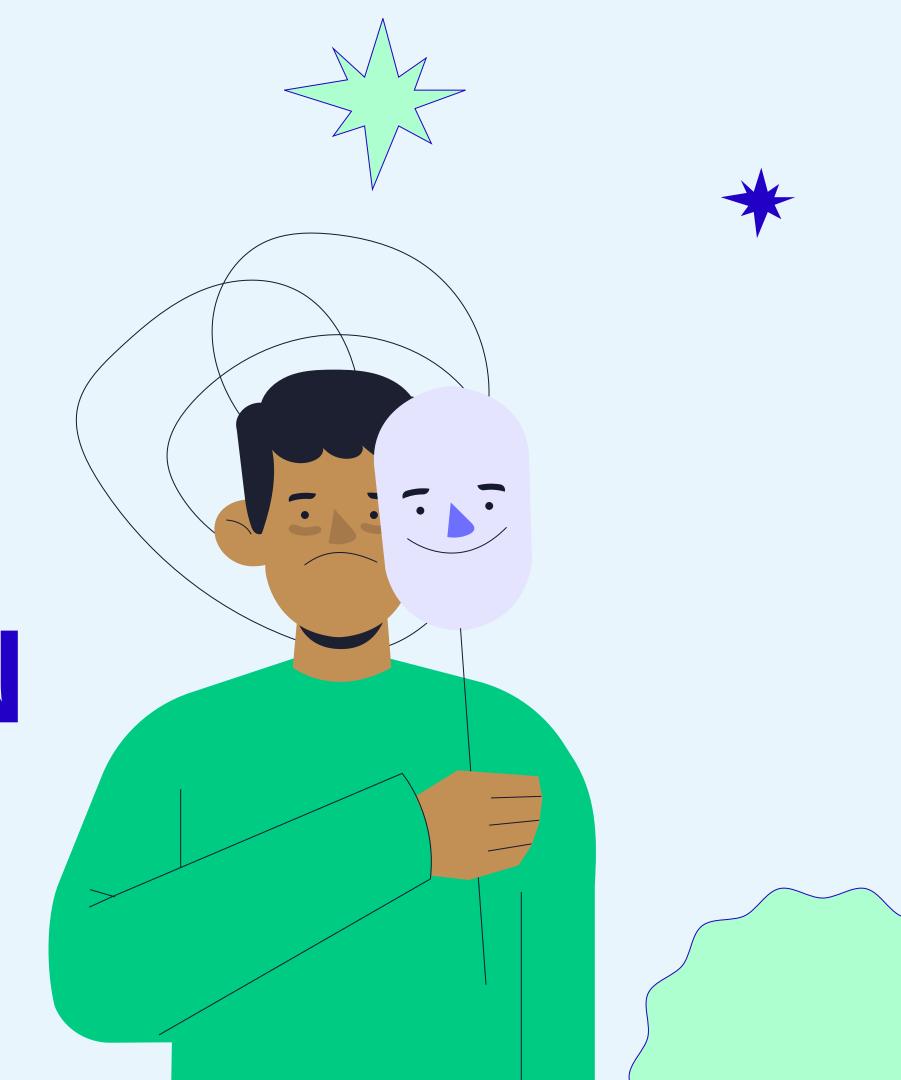


SARAN

Untuk analisis data yang optimal, direkomendasikan membuat database pada server khusus dengan pengoperasian menggunakan bahasa pemrograman SQL. Ini meningkatkan kinerja dan keamanan, serta mempermudah manipulasi data.



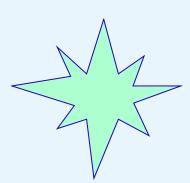
05 KESIMPULAN emari

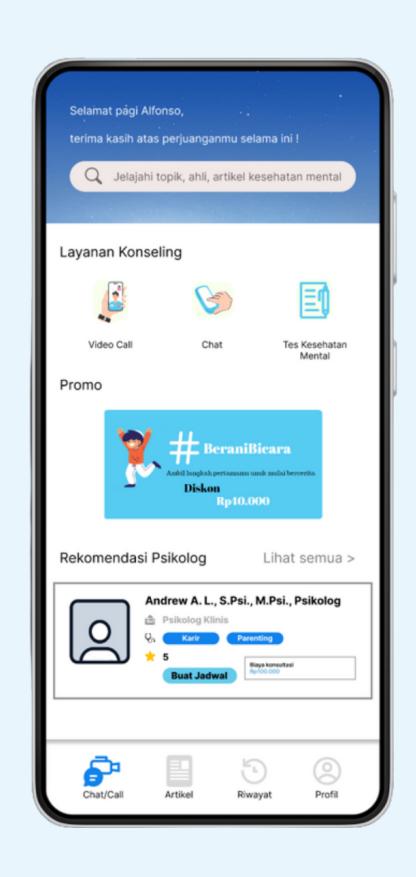


KESIMPULAN

Dalam pengembangan aplikasi JEMARI, penting bagi pengembang untuk menyediakan sistem basis data yang handal. Basis data yang efisien mendukung fungsi-fungsi kritis pada aplikasi JEMARI, memastikan penyimpanan, penarikan, dan analisis data pengguna dengan akurasi serta keamanan tinggi. Dengan basis data yang baik, JEMARI dapat menyediakan layanan kesehatan daring yang andal dan dapat diakses oleh semua kalangan, dan memastikan pengalaman pengguna yang baik.







Terima Kasih





