

## DAFTAR PUSTAKA

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## Lampiran 1.

	<p><b>KEMENTERIAN KESEHATAN REPUBLIK INDONESIA</b>  <b>DIREKTORAT JENDERAL PELAYANAN KESEHATAN</b>  <b>RUMAH SAKIT UMUM PUSAT DR. WAHIDIN SUDIROHUSODO</b>          Jalan Perintis Kemerdekaan Km. 11 Tamalanrea, Makassar, Kode Pos 90245          Telp. (0411) 584675 – 581818 (<i>Hunting</i>), Fax. (0411) 587676          Laman : <a href="http://www.rsupwahidin.com">www.rsupwahidin.com</a> Surat Elektronik : <a href="mailto:tu@rsupwahidin.com">tu@rsupwahidin.com</a></p>	
Nomor : DP.04.03/D.XIX.2/17431/2023	18 September 2023	
Hal : Izin Penelitian		

**Yth. Ketua Program Studi Ilmu Gizi Klinik  
 Fakultas Kedokteran Universitas Hasanuddin**

Sehubungan dengan surat saudara nomor 17217/UN4.6.8/PT.01.04/2023, tertanggal 21 Juli 2023, hal Permohonan Izin Penelitian, dapat kami fasilitasi dan memberikan izin pelaksanaan penelitian kepada:

Nama	: dr. Tien Muliawati Abadi
NIM	: C175181006
Prog. Pend.	: PPDS Ilmu Gizi Klinik
No. HP	: 08114226172
Judul	: Terapi Medik Gizi pada Pasien Kritis Kajian Terhadap Rasio Laktat Arteri dengan Albumin sebagai Prediktor Mortalitas di Ruang <i>Intensive Care Unit</i> RSUP Dr. Wahidin Sudirohusodo Makassar
Jangka Waktu	: Tiga Bulan Setelah Surat ini di Keluarkan
Lokasi	: Inst. Rekam Medik; Inst Sistem Informasi Rumah Sakit

dengan ketentuan sebagai berikut :

1. Sesuai dengan peraturan dan ketentuan penelitian yang berlaku di lingkup RSUP Dr Wahidin Sudirohusodo
2. Sebelum meneliti, peneliti wajib melapor kepada Pengawas Penelitian di masing-masing unit yang menjadi lokasi penelitian
3. Pelaksanaan penelitian tidak mengganggu proses pelayanan serta mendukung upaya peningkatan mutu pelayanan dan keselamatan pasien
4. Pemeriksaan penunjang, BHP dan lain-lain yang digunakan dalam penelitian, menjadi tanggung jawab peneliti, tidak dibebankan kepada pasien ataupun RS
5. Peneliti melaporkan proses penelitian secara periodik serta hasil penelitian di akhir waktu penelitian
6. Mencantumkan nama RSUP Dr Wahidin Sudirohusodo sebagai afiliasi institusi dalam naskah dan publikasi penelitian]
7. Surat Keterangan Selesai Penelitian menjadi salah satu syarat untuk mengikuti Seminar Hasil Penelitian
8. Bukti Penyerahan Skripsi/Thesis/Disertasi ke RSUP Dr Wahidin Sudirohusodo menjadi syarat penyelesaian studi

Mohon dapat dipastikan agar ketentuan tersebut dipenuhi peneliti sebelum menyelesaikan studi di institusi saudara. Atas perhatian dan Kerjasama yang baik, diucapkan terima kasih.

a.n. Direktur Utama  
 Direktur SDM, Pendidikan dan Penelitian,



Dr. dr. Nu'man AS Daud, Sp.PD, K-GEH, FINA SIM  
 NIP197112142000031004

Tembusan:

1. Kepala Instalasi Rekam Medik
2. Kepala Instalasi Sistem Informasi Rumah Sakit

## Lampiran 2 Rekomendasi Persetujuan Etik UNHAS



KEMENTERIAN PENDIDIKAN, KEBUDAYAAN, RISET DAN TEKNOLOGI  
UNIVERSITAS HASANUDDIN FAKULTAS KEDOKTERAN  
KOMITE ETIK PENELITIAN UNIVERSITAS HASANUDDIN  
RSPTN UNIVERSITAS HASANUDDIN  
RSUP Dr. WAHIDIN SUDIROHUSODO MAKASSAR  
Sekretariat : Lantai 2 Gedung Laboratorium Terpadu  
JL.PERINTIS KEMERDEKAAN KAMPUS TAMALANREA KM.10 MAKASSAR 90245.



Contact Person: dr. Agussalim Bukhari, MMed,PhD, SpGK TELP. 081241850858, 0411 5780103, Fax : 0411-581431

### REKOMENDASI PERSETUJUAN ETIK

Nomor : 624/UN4.6.4.5.31/ PP36/ 2023

Tanggal: 5 September 2023

Dengan ini Menyatakan bahwa Protokol dan Dokumen yang Berhubungan Dengan Protokol berikut ini telah mendapatkan Persetujuan Etik :

No Protokol	UH23080625	No Sponsor	
Peneliti Utama	<b>dr.Tien Muliawati Abadi</b>	Sponsor	
Judul Peneliti	TERAPI MEDIK GIZI PADA PASIEN KRITIS KAJIAN TERHADAP RASIO LAKTAT ARTERI DENGAN ALBUMIN SEBAGAI PREDIKTOR MORTALITAS DI RUANG INTENSIVE CARE UNIT RSUP WAHIDIN SUDIROHUSODO		
No Versi Protokol	<b>1</b>	Tanggal Versi	<b>24 Agustus 2023</b>
No Versi PSP	<b>1</b>	Tanggal Versi	<b>24 Agustus 2023</b>
Tempat Penelitian	RSUP Dr. Wahidin Sudirohusodo Makassar		
Jenis Review	<input type="checkbox"/> Exempted <input checked="" type="checkbox"/> Expedited <input type="checkbox"/> Fullboard Tanggal	Masa Berlaku <b>5 September 2023</b> sampai <b>5 September 2024</b>	Frekuensi review lanjutan
Ketua KEP Universitas Hasanuddin	Nama <b>Prof.Dr.dr. Suryani As'ad, M.Sc.,Sp.GK (K)</b>	Tanda tangan	
Sekretaris KEP Universitas Hasanuddin	Nama <b>dr. Agussalim Bukhari, M.Med.,Ph.D.,Sp.GK (K)</b>	Tanda tangan	

Kewajiban Peneliti Utama:

- Menyerahkan Amandemen Protokol untuk persetujuan sebelum di implementasikan
- Menyerahkan Laporan SAE ke Komisi Etik dalam 24 Jam dan dilengkapi dalam 7 hari dan Laporan SUSAR dalam 72 Jam setelah Peneliti Utama menerima laporan
- Menyerahkan Laporan Kemajuan (progress report) setiap 6 bulan untuk penelitian resiko tinggi dan setiap setahun untuk penelitian resiko rendah
- Menyerahkan laporan akhir setelah Penelitian berakhir
- Melaporkan penyimpangan dari protokol yang disetujui (protocol deviation / violation)
- Mematuhi semua peraturan yang ditentukan

### Lampiran 3. Hasil SPSS

#### Case Processing Summary

	Cases					
	Valid		Missing		Total	
	N	Percent	N	Percent	N	Percent
RLAhighlow * Mortality	375	100.0%	0	0.0%	375	100.0%

#### RLAhighlow \* Mortality Crosstabulation

			Mortality		Total
			Ya	Tidak	
RLAhighlow	High (>0.71)	Count	95	70	165
		% within RLAhighlow	57.6%	42.4%	100.0%
	Low (<=0.71)	Count	70	140	210
		% within RLAhighlow	33.3%	66.7%	100.0%
Total		Count	165	210	375
		% within RLAhighlow	44.0%	56.0%	100.0%

#### Chi-Square Tests

	Value	df	Asymptotic Significance (2-sided)	Exact Sig. (2- sided)	Exact Sig. (1- sided)	Point Probability
Pearson Chi-Square	22.039 <sup>a</sup>	1	.000	.000	.000	
Continuity Correction <sup>b</sup>	21.066	1	.000			
Likelihood Ratio	22.175	1	.000	.000	.000	
Fisher's Exact Test				.000	.000	
Linear-by-Linear Association	21.980 <sup>c</sup>	1	.000	.000	.000	.000
N of Valid Cases	375					

a. 0 cells (.0%) have expected count less than 5. The minimum expected count is 72.60.

b. Computed only for a 2x2 table

c. The standardized statistic is 4.688.

#### Risk Estimate

	Value	95% Confidence Interval	
		Lower	Upper
Odds Ratio for RLAhighlow (High (>0.71) / Low (<=0.71))	2.714	1.781	4.137
For cohort Mortality = Ya	1.727	1.370	2.178
For cohort Mortality = Tidak	.636	.520	.779
N of Valid Cases	375		

**SGA\_CB = C****Case Processing Summary<sup>a</sup>**

	Valid		Cases Missing		Total	
	N	Percent	N	Percent	N	Percent
RLAhighlow * Mortality	129	100.0%	0	0.0%	129	100.0%

a. SGA\_CB = C

**RLAhighlow \* Mortality Crosstabulation<sup>a</sup>**

			Mortality		Total
			Ya	Tidak	
RLAhighlow	High (>0.71)	Count	36	20	56
		% within RLAhighlow	64.3%	35.7%	100.0%
	Low (<=0.71)	Count	23	50	73
		% within RLAhighlow	31.5%	68.5%	100.0%
Total		Count	59	70	129
		% within RLAhighlow	45.7%	54.3%	100.0%

a. SGA\_CB = C

**Chi-Square Tests<sup>a</sup>**

	Value	df	Asymptotic Significance (2-sided)	Exact Sig. (2-sided)	Exact Sig. (1-sided)	Point Probability
Pearson Chi-Square	13.720 <sup>b</sup>	1	.000	.000	.000	
Continuity Correction <sup>c</sup>	12.431	1	.000			
Likelihood Ratio	13.924	1	.000	.000	.000	
Fisher's Exact Test				.000	.000	
Linear-by-Linear Association	13.613 <sup>d</sup>	1	.000	.000	.000	.000
N of Valid Cases	129					

a. SGA\_CB = C

b. 0 cells (.0%) have expected count less than 5. The minimum expected count is 25.61.

c. Computed only for a 2x2 table

d. The standardized statistic is 3.690.

**Risk Estimate<sup>a</sup>**

	Value	95% Confidence Interval	
		Lower	Upper
Odds Ratio for RLAhighlow (High (>0.71) / Low (<=0.71))	3.913	1.873	8.174
For cohort Mortality = Ya	2.040	1.381	3.015
For cohort Mortality = Tidak	.521	.355	.766
N of Valid Cases	129		

a. SGA\_CB = C

**AcidosisYN = Ya**

<b>Case Processing Summary<sup>a</sup></b>						
	Valid		Cases Missing		Total	
	N	Percent	N	Percent	N	Percent
RLAhighlow * Mortality	53	100.0%	0	0.0%	53	100.0%

a. AcidosisYN = Ya

**RLAhighlow \* Mortality Crosstabulation<sup>a</sup>**

			Mortality		Total
			Ya	Tidak	
RLAhighlow	High (>0.71)	Count	15	6	21
		% within RLAhighlow	71.4%	28.6%	100.0%
	Low (<=0.71)	Count	14	18	32
		% within RLAhighlow	43.8%	56.3%	100.0%
Total		Count	29	24	53
		% within RLAhighlow	54.7%	45.3%	100.0%

a. AcidosisYN = Ya

**Chi-Square Tests<sup>a</sup>**

	Value	df	Asymptotic Significance (2-sided)	Exact Sig. (2-sided)	Exact Sig. (1-sided)	Point Probability
Pearson Chi-Square	3.920 <sup>b</sup>	1	.048	.056	.044	
Continuity Correction <sup>c</sup>	2.883	1	.090			
Likelihood Ratio	4.014	1	.045	.056	.044	
Fisher's Exact Test				.056	.044	
Linear-by-Linear Association	3.846 <sup>d</sup>	1	.050	.056	.044	.033
N of Valid Cases	53					

a. AcidosisYN = Ya

b. 0 cells (.0%) have expected count less than 5. The minimum expected count is 9.51.

c. Computed only for a 2x2 table

d. The standardized statistic is 1.961.

**Risk Estimate<sup>a</sup>**

	Value	95% Confidence Interval	
		Lower	Upper
Odds Ratio for RLAhighlow (High (>0.71) / Low (<=0.71))	3.214	.991	10.424
For cohort Mortality = Ya	1.633	1.013	2.631
For cohort Mortality = Tidak	.508	.242	1.067
N of Valid Cases	53		

a. AcidosisYN = Ya

**AcidosisYN = Tidak****Case Processing Summary<sup>a</sup>**

	Valid		Cases Missing		Total	
	N	Percent	N	Percent	N	Percent
RLAhighlow * Mortality	322	100.0%	0	0.0%	322	100.0%

a. AcidosisYN = Tidak

**RLAhighlow \* Mortality Crosstabulation<sup>a</sup>**

			Mortality		Total
			Ya	Tidak	
RLAhighlow	High (>0.71)	Count	80	64	144
		% within RLAhighlow	55.6%	44.4%	100.0%
	Low (<=0.71)	Count	56	122	178
		% within RLAhighlow	31.5%	68.5%	100.0%
Total		Count	136	186	322
		% within RLAhighlow	42.2%	57.8%	100.0%

a. AcidosisYN = Tidak

**Chi-Square Tests<sup>a</sup>**

	Value	df	Asymptotic Significance (2-sided)	Exact Sig. (2-sided)	Exact Sig. (1-sided)	Point Probability
Pearson Chi-Square	18.942 <sup>b</sup>	1	.000	.000	.000	
Continuity Correction <sup>c</sup>	17.968	1	.000			
Likelihood Ratio	19.052	1	.000	.000	.000	
Fisher's Exact Test				.000	.000	
Linear-by-Linear Association	18.884 <sup>d</sup>	1	.000	.000	.000	.000
N of Valid Cases	322					

a. AcidosisYN = Tidak

b. 0 cells (.0%) have expected count less than 5. The minimum expected count is 60.82.

c. Computed only for a 2x2 table

d. The standardized statistic is 4.346.

**Risk Estimate<sup>a</sup>**

	Value	95% Confidence Interval	
		Lower	Upper
Odds Ratio for RLAhighlow (High (>0.71) / Low (<=0.71))	2.723	1.726	4.297
For cohort Mortality = Ya	1.766	1.360	2.294
For cohort Mortality = Tidak	.648	.527	.798
N of Valid Cases	322		

a. AcidosisYN = Tidak

**Sex = Laki-laki****Case Processing Summary<sup>a</sup>**

	Valid		Cases Missing		Total	
	N	Percent	N	Percent	N	Percent
RLAhighlow * Mortality	197	100.0%	0	0.0%	197	100.0%

a. Sex = Laki-laki

**RLAhighlow \* Mortality Crosstabulation<sup>a</sup>**

			Mortality		Total
			Ya	Tidak	
RLAhighlow	High (>0.71)	Count	54	33	87
		% within RLAhighlow	62.1%	37.9%	100.0%
	Low (<=0.71)	Count	42	68	110
		% within RLAhighlow	38.2%	61.8%	100.0%
Total		Count	96	101	197
		% within RLAhighlow	48.7%	51.3%	100.0%

a. Sex = Laki-laki

**Chi-Square Tests<sup>a</sup>**

	Value	df	Asymptotic Significance (2-sided)	Exact Sig. (2-sided)	Exact Sig. (1-sided)	Point Probability
Pearson Chi-Square	11.095 <sup>b</sup>	1	.001	.001	.001	
Continuity Correction <sup>c</sup>	10.159	1	.001			
Likelihood Ratio	11.196	1	.001	.001	.001	
Fisher's Exact Test				.001	.001	
Linear-by-Linear Association	11.038 <sup>d</sup>	1	.001	.001	.001	.000
N of Valid Cases	197					

a. Sex = Laki-laki

b. 0 cells (.0%) have expected count less than 5. The minimum expected count is 42.40.

c. Computed only for a 2x2 table

d. The standardized statistic is 3.322.

**Risk Estimate<sup>a</sup>**

	Value	95% Confidence Interval	
		Lower	Upper
Odds Ratio for RLAhighlow (High (>0.71) / Low (<=0.71))	2.649	1.485	4.728
For cohort Mortality = Ya	1.626	1.218	2.170
For cohort Mortality = Tidak	.614	.452	.833
N of Valid Cases	197		

a. Sex = Laki-laki

**Sex = Perempuan****Case Processing Summary<sup>a</sup>**

	Valid		Missing		Total	
	N	Percent	N	Percent	N	Percent
RLAhighlow * Mortality	178	100.0%	0	0.0%	178	100.0%

a. Sex = Perempuan

**RLAhighlow \* Mortality Crosstabulation<sup>a</sup>**

			Mortality		Total
			Ya	Tidak	
RLAhighlow	High (>0.71)	Count	41	37	78
		% within RLAhighlow	52.6%	47.4%	100.0%
	Low (<=0.71)	Count	28	72	100
		% within RLAhighlow	28.0%	72.0%	100.0%
Total		Count	69	109	178
		% within RLAhighlow	38.8%	61.2%	100.0%

a. Sex = Perempuan

**Chi-Square Tests<sup>a</sup>**

	Value	df	Asymptotic Significance (2-sided)	Exact Sig. (2-sided)	Exact Sig. (1-sided)	Point Probability
Pearson Chi-Square	11.139 <sup>b</sup>	1	.001	.001	.001	
Continuity Correction <sup>c</sup>	10.128	1	.001			
Likelihood Ratio	11.178	1	.001	.001	.001	
Fisher's Exact Test				.001	.001	
Linear-by-Linear Association	11.076 <sup>d</sup>	1	.001	.001	.001	.000
N of Valid Cases	178					

a. Sex = Perempuan

b. 0 cells (.0%) have expected count less than 5. The minimum expected count is 30.24.

c. Computed only for a 2x2 table

d. The standardized statistic is 3.328.

**Risk Estimate<sup>a</sup>**

	Value	95% Confidence Interval	
		Lower	Upper
Odds Ratio for RLAhighlow (High (>0.71) / Low (<=0.71))	2.849	1.528	5.313
For cohort Mortality = Ya	1.877	1.286	2.741
For cohort Mortality = Tidak	.659	.506	.858
N of Valid Cases	178		

a. Sex = Perempuan



**VentilatorUsed = Ya****Case Processing Summary<sup>a</sup>**

	Valid		Cases Missing		Total	
	N	Percent	N	Percent	N	Percent
RLAhighlow * Mortality	235	100.0%	0	0.0%	235	100.0%

a. VentilatorUsed = Ya

**RLAhighlow \* Mortality Crosstabulation<sup>a</sup>**

			Mortality		Total
			Ya	Tidak	
RLAhighlow	High (>0.71)	Count	82	18	100
		% within RLAhighlow	82.0%	18.0%	100.0%
	Low (<=0.71)	Count	54	81	135
		% within RLAhighlow	40.0%	60.0%	100.0%
Total		Count	136	99	235
		% within RLAhighlow	57.9%	42.1%	100.0%

a. VentilatorUsed = Ya

**Chi-Square Tests<sup>a</sup>**

	Value	df	Asymptotic Significance (2-sided)	Exact Sig. (2-sided)	Exact Sig. (1-sided)	Point Probability
Pearson Chi-Square	41.565 <sup>b</sup>	1	.000	.000	.000	
Continuity Correction <sup>c</sup>	39.860	1	.000			
Likelihood Ratio	43.937	1	.000	.000	.000	
Fisher's Exact Test				.000	.000	
Linear-by-Linear Association	41.388 <sup>d</sup>	1	.000	.000	.000	.000
N of Valid Cases	235					

a. VentilatorUsed = Ya

b. 0 cells (.0%) have expected count less than 5. The minimum expected count is 42.13.

c. Computed only for a 2x2 table

d. The standardized statistic is 6.433.

**Risk Estimate<sup>a</sup>**

	Value	95% Confidence Interval	
		Lower	Upper
Odds Ratio for RLAhighlow (High (>0.71) / Low (<=0.71))	6.833	3.693	12.645
For cohort Mortality = Ya	2.050	1.635	2.570
For cohort Mortality = Tidak	.300	.193	.466
N of Valid Cases	235		

a. VentilatorUsed = Ya

**VentilatorUsed = Tidak****Case Processing Summary<sup>a</sup>**

	Valid		Cases Missing		Total	
	N	Percent	N	Percent	N	Percent
RLAhighlow * Mortality	140	100.0%	0	0.0%	140	100.0%

a. VentilatorUsed = Tidak

**RLAhighlow \* Mortality Crosstabulation<sup>a</sup>**

			Mortality		Total
			Ya	Tidak	
RLAhighlow	High (>0.71)	Count	13	52	65
		% within RLAhighlow	20.0%	80.0%	100.0%
	Low (<=0.71)	Count	16	59	75
		% within RLAhighlow	21.3%	78.7%	100.0%
Total		Count	29	111	140
		% within RLAhighlow	20.7%	79.3%	100.0%

a. VentilatorUsed = Tidak

**Chi-Square Tests<sup>a</sup>**

	Value	df	Asymptotic Significance (2-sided)	Exact Sig. (2-sided)	Exact Sig. (1-sided)	Point Probability
Pearson Chi-Square	.038 <sup>b</sup>	1	.846	1.000	.507	
Continuity Correction <sup>c</sup>	.000	1	1.000			
Likelihood Ratio	.038	1	.846	1.000	.507	
Fisher's Exact Test				1.000	.507	
Linear-by-Linear Association	.037 <sup>d</sup>	1	.847	1.000	.507	.163
N of Valid Cases	140					

a. VentilatorUsed = Tidak

b. 0 cells (.0%) have expected count less than 5. The minimum expected count is 13.46.

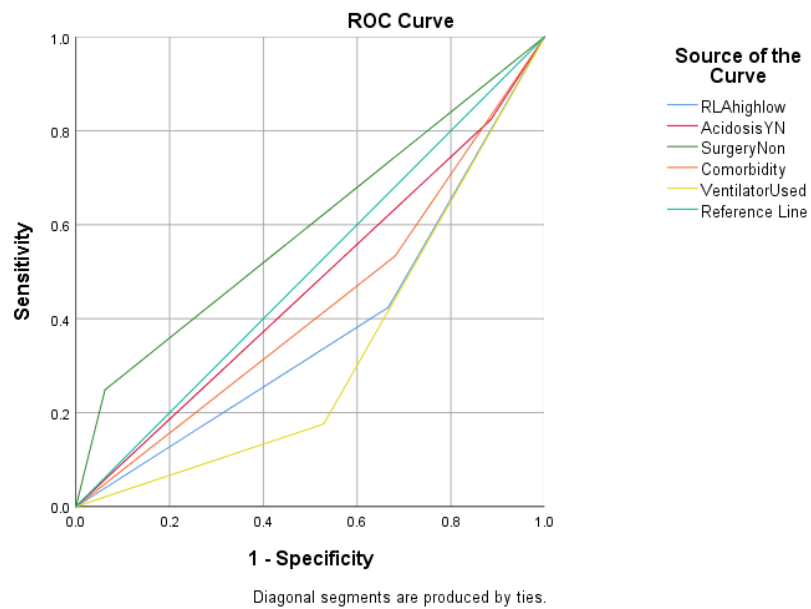
c. Computed only for a 2x2 table

d. The standardized statistic is -.193.

**Risk Estimate<sup>a</sup>**

	Value	95% Confidence Interval	
		Lower	Upper
Odds Ratio for RLAhighlow (High (>0.71) / Low (<=0.71))	.922	.405	2.096
For cohort Mortality = Ya	.938	.488	1.800
For cohort Mortality = Tidak	1.017	.859	1.205
N of Valid Cases	140		

a. VentilatorUsed = Tidak



### Area Under the Curve

Test Result Variable(s)	Area	Std. Error <sup>a</sup>	Asymptotic Sig. <sup>b</sup>	Asymptotic 95% Confidence Interval	
				Lower Bound	Upper Bound
RLAhighlow	.379	.029	.000	.321	.436
AcidosisYN	.469	.030	.307	.410	.528
SurgeryNon	.593	.030	.002	.534	.652
Comorbidity	.426	.030	.014	.368	.485
VentilatorUsed	.324	.028	.000	.269	.378

The test result variable(s): RLAhighlow, AcidosisYN, SurgeryNon, Comorbidity, VentilatorUsed has at least one tie between the positive actual state group and the negative actual state group. Statistics may be biased.

a. Under the nonparametric assumption

b. Null hypothesis: true area = 0.5

## ROC Curve

### Notes

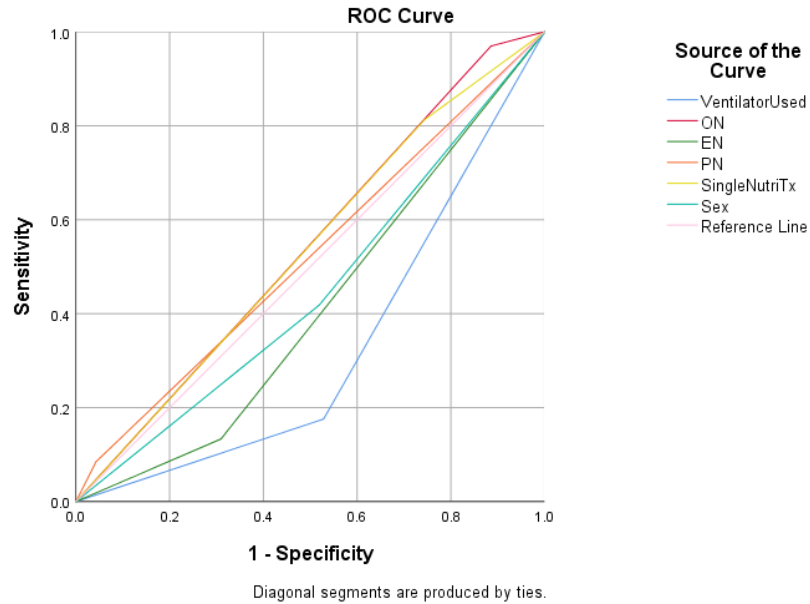
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Comments		
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	Active Dataset	DataSet1
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	Weight	<none>
	Split File	<none>
	N of Rows in Working Data File	375
	Missing Value Handling	Definition of Missing
	Cases Used	Statistics are based on all cases with valid data for all variables in the analysis.
Syntax		ROC VentilatorUsed ON EN PN SingleNutriTx Sex BY Mortality (1) /PLOT=CURVE(REFERENCE) /PRINT=SE  /CRITERIA=CUTOFF(INCLUDE) TESTPOS(LARGE) DISTRIBUTION(FREE) CI(95) /MISSING=EXCLUDE.
Resources	Processor Time	00:00:00.11
	Elapsed Time	00:00:00.10

### Case Processing Summary

Mortality	Valid N (listwise)
Positive <sup>a</sup>	165
Negative	210

Larger values of the test result variable(s) indicate stronger evidence for a positive actual state.

a. The positive actual state is Ya.



**Area Under the Curve**

Test Result Variable(s)	Area	Std. Error <sup>a</sup>	Asymptotic Sig. <sup>b</sup>	Asymptotic 95% Confidence Interval	
				Lower Bound	Upper Bound
VentilatorUsed	.324	.028	.000	.269	.378
ON	.542	.030	.163	.484	.600
EN	.412	.029	.003	.355	.469
PN	.521	.030	.485	.462	.580
SingleNutriTx	.535	.030	.249	.476	.593
Sex	.450	.030	.094	.391	.508

The test result variable(s): VentilatorUsed, ON, EN, PN, SingleNutriTx, Sex has at least one tie between the positive actual state group and the negative actual state group. Statistics may be biased.

a. Under the nonparametric assumption

b. Null hypothesis: true area = 0.5