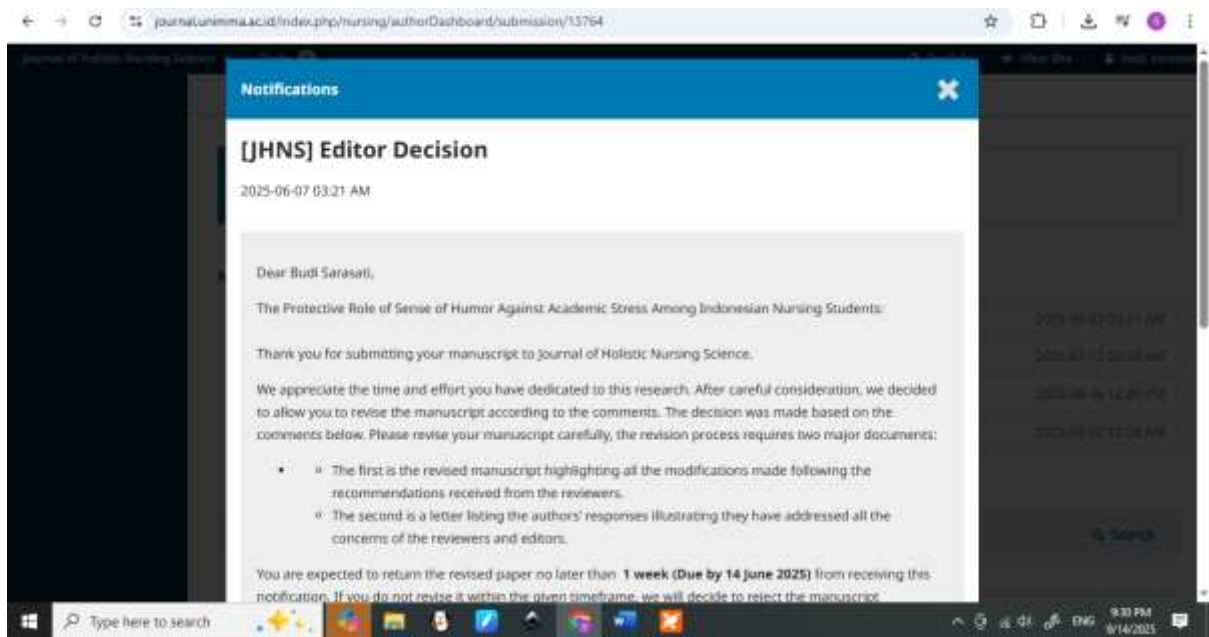
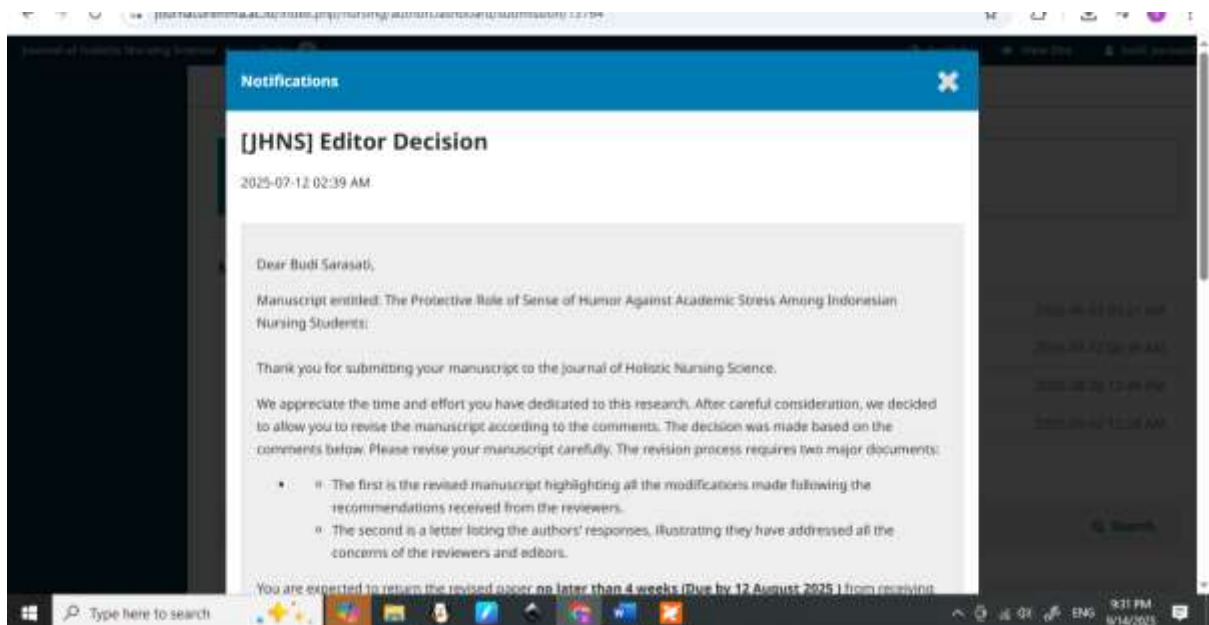
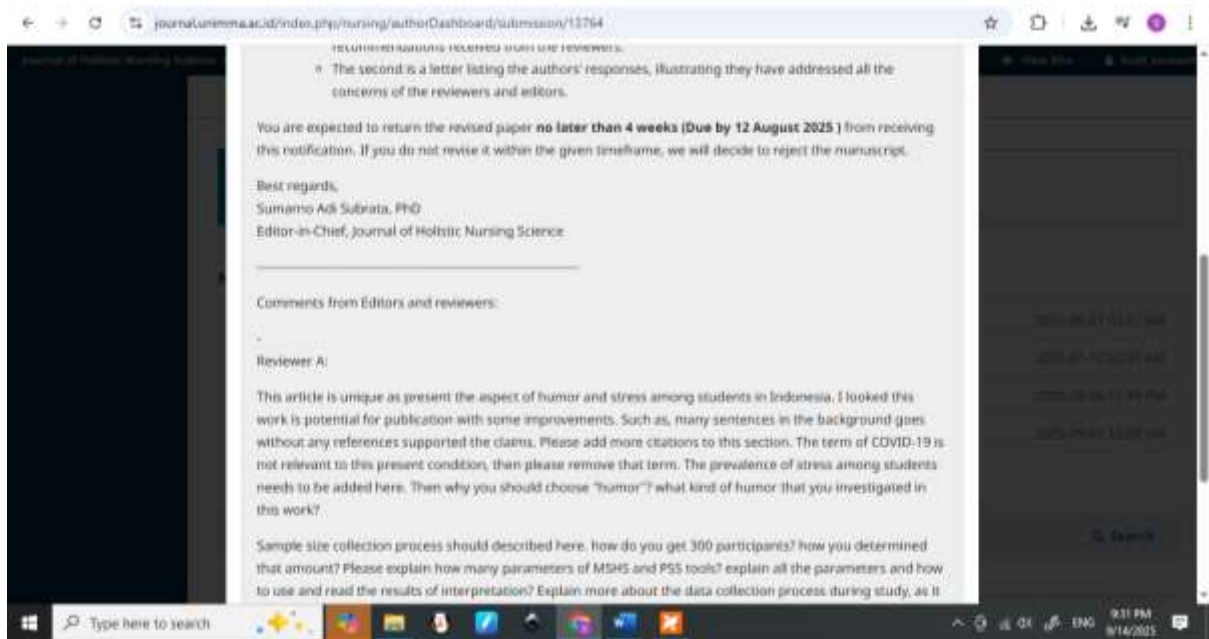


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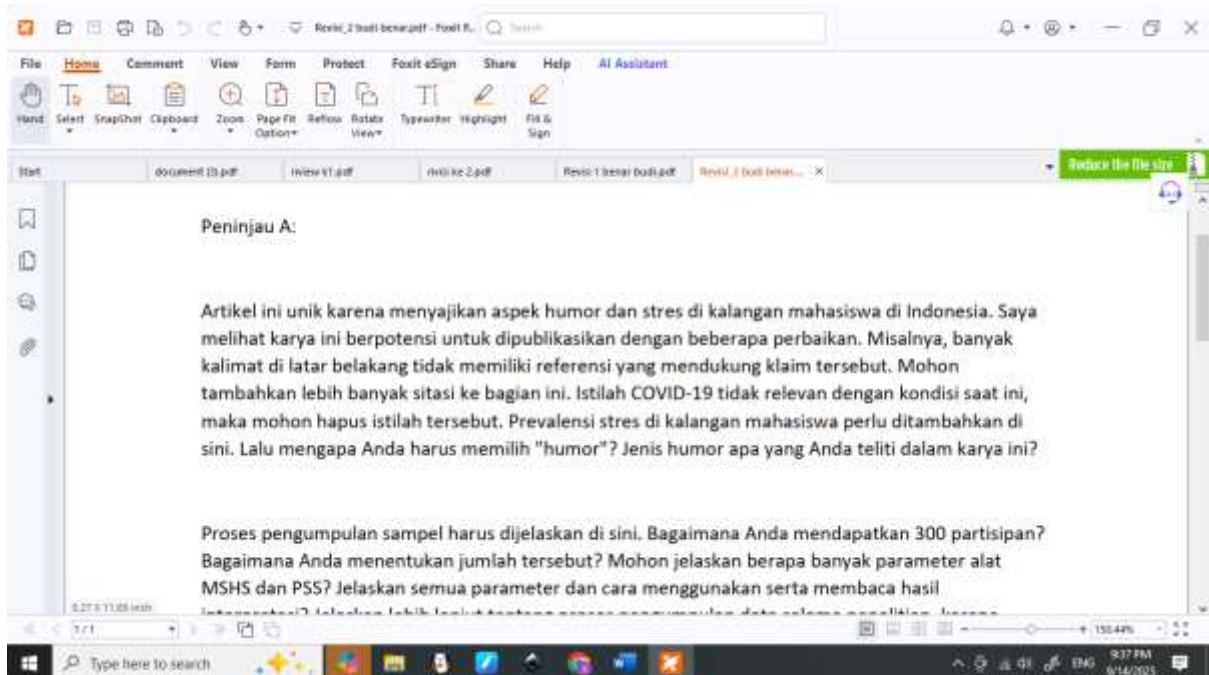


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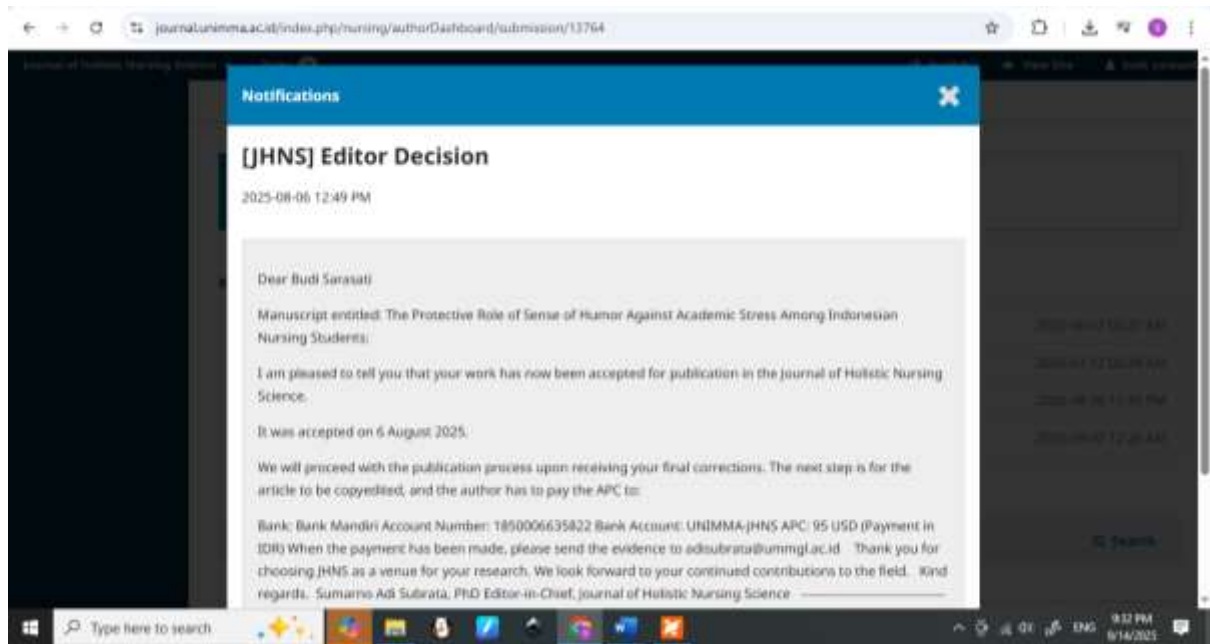




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ARTIKEL

JUDUL

Peran Protektif Sense Humor Terhadap Stres Akademik pada Mahasiswa Keperawatan Indonesia: Analisis Multivariat Kuantitatif

ABSTRAK

Latar Belakang:

Mahasiswa keperawatan sering menghadapi tekanan akademik yang tinggi akibat tuntutan ganda dari pembelajaran teori dan tanggung jawab praktik klinik. Tekanan ini dapat berdampak negatif terhadap kesejahteraan psikologis dan performa akademik mereka. Studi terbaru menunjukkan bahwa humor dapat berfungsi sebagai penyangga psikologis yang meningkatkan resiliensi emosional serta kemampuan mahasiswa dalam menghadapi tantangan akademik.

Tujuan:

Penelitian ini bertujuan untuk mengkaji hubungan antara sense of humor dan stres akademik yang dirasakan oleh mahasiswa sarjana keperawatan di Bekasi, serta mengevaluasi apakah humor berperan sebagai faktor protektif psikologis setelah dikontrol dengan variabel demografis yang relevan.

Metode:

Penelitian ini menggunakan survei potong lintang terhadap 300 mahasiswa tingkat akhir dari program studi keperawatan. Instrumen yang digunakan meliputi Multidimensional Sense of Humor Scale (MSHS) dan versi adaptasi budaya dari Perceived Stress Scale (PSS). Analisis bivariat dilakukan untuk mengidentifikasi variabel dengan nilai $p < 0,25$ yang selanjutnya dimasukkan ke dalam model regresi logistik multivariat. Interpretasi asosiasi dilakukan dengan menggunakan rasio odds tersesuaikan (Adjusted Odds Ratio/AOR).

Hasil:

Mahasiswa dengan skor humor tinggi secara signifikan lebih kecil kemungkinannya untuk mengalami stres akademik tinggi (AOR = 0,363; CI 95%: 0,224–0,589), yang berarti bahwa mereka sekitar 2,75 kali lebih kecil kemungkinan mengalami tingkat stres yang tinggi. Humor tetap menjadi prediktor signifikan setelah dikontrol dengan variabel lama studi. Model regresi akhir menjelaskan 7,9% variabilitas status stres (Nagelkerke $R^2 = 0,079$).

Kesimpulan:

Sense of humor dapat menjadi sumber daya koping yang bermanfaat dalam menurunkan stres akademik di lingkungan pendidikan yang penuh tekanan. Meskipun kontribusi variabel terhadap model bersifat moderat, temuan ini mendukung integrasi strategi berbasis humor dalam program kesehatan mental mahasiswa. Penelitian lanjutan disarankan untuk mengevaluasi intervensi berbasis humor secara longitudinal dan dalam konteks akademik yang beragam.

Kata kunci:

stres akademik, humor, pendidikan keperawatan, resiliensi, regulasi emosi

PENDAHULUAN

Pendidikan keperawatan secara luas diakui sebagai salah satu bidang akademik yang paling menantang karena tuntutan yang ganda: penguasaan teori dan keterampilan klinis. Mahasiswa dituntut untuk memahami konsep ilmiah yang kompleks sekaligus mampu menerapkannya di lingkungan klinis yang intens secara emosional. Kombinasi beban kognitif dan emosional ini menempatkan mahasiswa keperawatan pada risiko tinggi mengalami stres akademik (Aslan & Akturk, 2018). Dalam konteks ini, stres akademik merujuk pada tekanan psikologis akibat ekspektasi akademik yang tinggi, ketakutan akan kegagalan, dan beban tugas yang berlebihan (Ahmad Zaki, et al., 2022). Semakin banyak penelitian menunjukkan bahwa mahasiswa keperawatan sering mengalami tingkat stres yang tinggi, yang dapat berdampak buruk pada kinerja akademis, kesejahteraan psikologis, dan kualitas hidup mereka secara keseluruhan (Younas, 2016).

Paparan jangka panjang terhadap stres akademik dapat menyebabkan kecemasan, kelelahan emosional, depresi, dan penurunan efikasi diri akademik. Penelitian juga menunjukkan bahwa stres akademik kronis dapat mengganggu konsentrasi, pengambilan keputusan, memori, dan semua fungsi penting yang dibutuhkan dalam proses pembelajaran dan praktik klinik (Mohamed, et al., 2024). Hal ini menjadi sangat penting dalam pendidikan keperawatan, di mana kesehatan mental yang buruk dapat berdampak negatif terhadap performa klinis dan keselamatan pasien. Faktor stres tambahan seperti tekanan sosial, beban keuangan, dan perfeksionisme pribadi turut memperburuk kondisi tersebut.

Kejadian stres akademik mencapai angka tertinggi sejak masa pandemi, transisi belajar offline ke belajar daring, terbatasnya akses praktik klinis, serta ketidakpastian masa depan karier menambah lapisan baru terhadap stres yang dirasakan mahasiswa di bidang kesehatan (Smith, et al., 2022; Overbaugh, et al., 2022). Hasil penelitian Aulia dan Panjaitan (2019) menunjukkan bahwa mayoritas mahasiswa tingkat akhir fakultas ilmu keperawatan di salah satu perguruan tinggi terkenal di Indonesia yang sedang mengerjakan skripsi mengalami tingkat stres sedang berjumlah 77 orang (71,3%) dan tingkat stres berat sebanyak 16 orang (14,8%). Penelitian Angelin et.al., (2021) menghasilkan hubungan yang signifikan antara tingkat stres dengan kejadian *Generalized Anxiety Disorder* (GAD) pada mahasiswa keperawatan tingkat akhir yang sedang menghadapi skripsi. Studi ilmiah oleh Ambarwati et.al., (2017) menghasilkan pengukuran tingkat stres pada mahasiswa tingkat akhir di salah satu Universitas di Magelang mengalami stres sedang dan kebanyakan dialami oleh mahasiswa perempuan. Shehadeh et.al., (2020) memaparkan mahasiswa keperawatan memiliki tingkat self efficacy sedang, tingkat stres akademis tinggi, dan tingkat kepuasan rendah hingga sedang terhadap kurikulum dan kinerja fakultas. Penelitian Shin (2016) pada mahasiswa keperawatan di Korea menghasilkan Stres akademik mahasiswa memiliki dampak signifikan terhadap depresi mereka dan Efek moderasi dari resiliensi akademik tidak memiliki dampak signifikan. Stres pada tingkat yang lebih serius dapat menyebabkan perilaku ekstrim seperti pada penelitian Becker (2018) terhadap 1.704 partisipan yang berstatus mahasiswa dari dua Universitas yang berbeda. Hasilnya 4% dari jumlah partisipan melaporkan upaya bunuh diri dan 2,2% hasil menyatakan adanya kemungkinan percobaan tindakan bunuh diri. Stres akademik juga terjadi karena transisi dari pembelajaran berbasis kelas ke pengalaman klinis langsung

yang dapat semakin meningkatkan tingkat stres selama pelatihan (Suen, et al., 2016). Selain itu, faktor individu seperti kualitas tidur, asupan kafein, dan stres yang dirasakan telah terbukti memengaruhi kesehatan mental dan kesejahteraan mahasiswa keperawatan secara keseluruhan secara signifikan (Higbee, et al., 2022).

Sarafino dan Smith (2012) mengkategorikan gejala stres berdasarkan pada 2 aspek yaitu aspek biologis seperti merasa sakit kepala, gangguan tidur, gangguan pencernaan, otot-otot tegang, pernafasan dan detak jantung tidak teratur, merasa gugup, cemas, gelisah dan adanya perubahan pola makan. Pada aspek psikologis gejala stres dapat berupa gejala kognisi, gejala emosi (mudah marah atau kesulitan mengontrol perasaan, merasa sedih, dan depresi), dan gejala tingkah laku yang cenderung ke arah negatif (kehilangan minat, sulit untuk bekerja sama).

Thorson & Powell (1991) menyatakan humor adalah salah satu strategi *coping* mengatasi stres. Humor dapat mengatasi tekanan-tekanan atau masalah dengan cara lelucon sehingga dapat memicu kebahagiaan. Salah satu perilaku humor adalah dengan tertawa hingga menciptakan perasaan tenang/rileks, menurunkan ketegangan, dan memberikan ruang untuk berpikir lebih jernih. Mahasiswa dapat menjadikan humor sebagai salah satu cara alternatif dalam mengantisipasi, mengontrol dan menurunkan gejala-gejala stres yang mengganggu aktivitas mahasiswa dalam menyelesaikan skripsi.

Stres dan Resiliensi dalam Pendidikan Keperawatan

Stres berkaitan dengan berbagai dampak buruk bagi mahasiswa keperawatan, yang memengaruhi kesejahteraan fisik dan psikologis serta kinerja akademis mereka. Afzal (2016) melaporkan bahwa tingkat stres yang tinggi dapat berkontribusi terhadap persepsi negatif terhadap profesi keperawatan, paparan ketidaksohonestan dari staf kesehatan, dan pengalaman perilaku tidak manusiawi, yang semuanya dapat memperburuk stres mahasiswa. Demikian pula, Sharma et al. (2022) menemukan bahwa stres dapat menyebabkan ketakutan melakukan kesalahan klinis, kritik dari rekan kerja dan staf senior, akses yang tidak memadai terhadap peralatan dan pengetahuan, prestasi akademik yang lebih rendah, dan kesulitan menjaga keseimbangan yang sehat antara belajar dan kehidupan pribadi.

Secara psikologis, stres bukan sekadar reaksi terhadap tekanan eksternal, melainkan proses dinamis yang dipengaruhi oleh penilaian individu dan strategi koping. Menurut model transaksional dari Lazarus dan Folkman (1984), stres terjadi ketika seseorang merasa bahwa tuntutan lingkungan melebihi kemampuan sumber daya pribadi yang dimiliki. Dengan demikian, penguatan strategi koping mahasiswa menjadi elemen penting dalam mengurangi dampak negatif dari stres akademik.

Salah satu sumber koping yang semakin banyak diteliti adalah resiliensi, yaitu kemampuan untuk beradaptasi secara positif dalam menghadapi kesulitan. Mahasiswa yang resilien cenderung menunjukkan keterlibatan akademik yang lebih tinggi, kesehatan mental yang lebih baik, dan kepuasan belajar yang lebih besar (Yoshioka & Kaneko, 2021). Resiliensi bukanlah sifat bawaan, tetapi kapasitas yang dapat dikembangkan melalui pengalaman pribadi dan dukungan sosial. Faktor psikologis seperti optimisme, regulasi emosi, dukungan sosial, dan sense of humor

telah diidentifikasi sebagai kontributor penting dalam membangun resiliensi di lingkungan pendidikan (Jang, 2024).

Humor sebagai Penguat Resiliensi

Dalam kerangka psikologi positif, humor dipahami sebagai sumber daya multidimensional yang memperkuat resiliensi emosional. Humor didefinisikan sebagai kapasitas kognitif dan emosional untuk menangkap, menikmati, atau mengekspresikan hal yang lucu atau menghibur. Humor membantu regulasi stres dengan memungkinkan individu untuk menafsirkan pengalaman sulit secara lebih positif (Martin & Lefcourt, 1983). Bukti empiris menunjukkan bahwa individu dengan selera humor yang berkembang baik cenderung menunjukkan regulasi emosi yang lebih baik, merasakan dukungan sosial yang lebih besar, dan menunjukkan ketahanan yang lebih tinggi dalam lingkungan akademis dan klinis (Bartzik, et al., 2021; Mohamed, et al., 2024). Dalam konteks akademik, penggunaan humor secara tepat terbukti mampu menurunkan kecemasan, meningkatkan keterlibatan belajar, bahkan memperkuat retensi informasi (Fritz, et al., 2017).

Penelitian neuropsikologis menunjukkan bahwa tawa dan afek positif yang ditimbulkan oleh humor dapat mengaktifkan sistem otak yang berhubungan dengan penurunan stres, termasuk penurunan kadar kortisol dan peningkatan endorfin serta serotonin (Martin, 2001). Oleh karena itu, humor berfungsi tidak hanya sebagai alat sosial, tetapi juga sebagai mekanisme fisiologis dalam menghadapi tekanan psikologis.

Studi eksperimental menunjukkan efektivitas berbagai intervensi berbasis humor, seperti terapi tawa, lokakarya komedi, dan penulisan reflektif humor, dalam meredakan tekanan psikologis mahasiswa (Rashmi & Sunitha, 2023). Tinjauan sistematis oleh Wulandari dan Wardani (2022) juga menegaskan bahwa humor berkontribusi terhadap kesehatan mental, terutama dalam konteks pendidikan klinik yang penuh tekanan.

Mengukur Humor: Kerangka Teoretis dan Empiris

Untuk menilai humor secara sistematis, para peneliti menggunakan alat ukur seperti Multidimensional Sense of Humor Scale (MSHS) yang dikembangkan oleh Thorson dan Powell (1991). Instrumen ini menilai empat dimensi humor: produksi humor, apresiasi, koping melalui humor, dan sikap terhadap humor. Skala ini telah divalidasi secara luas lintas budaya dan banyak digunakan dalam penelitian mengenai resiliensi.

Sejumlah studi telah membuktikan peran protektif humor terhadap stres, terutama pada profesi bertekanan tinggi seperti tenaga kesehatan, pendidik, dan pekerja layanan publik (Greve, et al., 2021; Richards & Kruger, 2017). Studi empiris terkini dalam berbagai konteks internasional melaporkan korelasi negatif antara humor dan stres yang dirasakan (Canestrari, et al., 2021). Meski manfaat umum humor bersifat universal, cara humor diekspresikan dan diterima sangat dipengaruhi oleh norma budaya. Oleh karena itu, penting untuk memahami konteks budaya saat merancang intervensi berbasis humor.

Kesenjangan Riset dan Alasan Penelitian

Meski minat terhadap humor sebagai mekanisme koping semakin meningkat, sangat sedikit penelitian empiris yang secara khusus mengkaji peran humor di kalangan mahasiswa keperawatan di Asia Tenggara, khususnya Indonesia. Hal ini menjadi kesenjangan kritis, mengingat lanskap pendidikan Indonesia ditandai oleh gaya pengajaran yang hierarkis, keterbatasan akses terhadap layanan kesehatan mental, dan ekspektasi sosial budaya yang kuat.

Selain itu, sebagian besar studi sebelumnya hanya mengandalkan analisis korelasional, tanpa mengontrol faktor-faktor perancu seperti usia, jenis kelamin, dan tingkat akademik. Oleh karena itu, peran prediktif humor secara independen belum sepenuhnya jelas. Studi ini bertujuan mengisi kesenjangan tersebut dengan menggunakan pendekatan regresi logistik multivariat untuk menguji apakah sense of humor dapat memprediksi tingkat stres akademik secara independen di kalangan **mahasiswa program studi keperawatan**.

METODE

Desain Penelitian dan Partisipan

Penelitian ini menggunakan desain kuantitatif dengan pendekatan potong lintang (cross-sectional) untuk menganalisis hubungan antara sense of humor dan stres akademik pada **mahasiswa keperawatan tingkat akhir**. Penentuan jumlah partisipan (sample size determination) menggunakan pedoman umum untuk analisis regresi logistik yang merekomendasikan minimal 10–20 partisipan per variabel bebas dalam model untuk menghindari overfitting (Peduzzi et al., 1996). Dalam penelitian ini, diperkirakan akan ada maksimal 5 variabel prediktor, sehingga diperlukan minimal 100 partisipan (5×20). Namun, untuk meningkatkan kekuatan statistik dan generalisasi, target dinaikkan menjadi minimal 250 partisipan. Untuk mengantisipasi kemungkinan data tidak lengkap atau drop-out, ditetapkan target rekrutmen sekitar 300 mahasiswa.

Prosedur perekrutan partisipan:

Partisipan direkrut dengan menggunakan purposive sampling, fokus pada mahasiswa program keperawatan tingkat akhir dari beberapa kelas paralel pada dua semester terakhir. Sebelumnya, peneliti bekerja sama dengan pihak program studi untuk memperoleh daftar kelas yang memenuhi kriteria. Pengumuman penelitian dilakukan melalui pertemuan tatap muka di kelas, melalui dosen pengampu, dan melalui grup komunikasi mahasiswa (WhatsApp). Partisipan harus memenuhi kriteria inklusi. Peneliti menetapkan kriteria inklusi adalah mahasiswa aktif program keperawatan, sedang menempuh semester akhir (7–8), usia 20–25 tahun, bersedia mengikuti penelitian dan menandatangani informed consent. Adapun kriteria eksklusi yaitu mahasiswa yang sedang cuti akademik, memiliki riwayat gangguan psikiatrik serius yang terdiagnosis, atau tidak mengisi kuesioner secara lengkap. Pada tahap akhir keterlibatan final adalah dari sekitar 325 mahasiswa yang diundang, sebanyak

312 mahasiswa mengisi kuesioner. Setelah proses pemeriksaan data, 12 kuesioner dinyatakan tidak lengkap, sehingga data analisis akhir menggunakan 300 partisipan.

Proses pengumpulan data

Pengumpulan data dalam penelitian ini dilaksanakan selama periode April hingga Mei 2025 dengan beberapa tahapan terstruktur, sebagai berikut: 1) Koordinasi awal dengan pihak fakultas. Peneliti terlebih dahulu melakukan audiensi dengan pimpinan program studi keperawatan untuk mendapatkan izin pelaksanaan penelitian di lingkungan kampus dan memastikan jadwal kuliah yang memungkinkan penyebaran kuesioner tanpa mengganggu aktivitas akademik. Selanjutnya 2) Sosialisasi kepada calon partisipan. Penjelasan tujuan, manfaat, prosedur, hak dan kewajiban partisipan disampaikan secara lisan kepada mahasiswa pada beberapa kelas tatap muka oleh peneliti bersama dosen pengampu. Selain itu, informasi penelitian disebarkan melalui grup WhatsApp resmi angkatan untuk memastikan mahasiswa yang tidak hadir di kelas tetap mendapatkan penjelasan. Langkah berikutnya adalah 3) Penyampaian informed consent. Mahasiswa yang bersedia berpartisipasi diminta menandatangani lembar persetujuan partisipasi (informed consent) yang menyatakan kesediaan mereka secara sukarela, menjamin kerahasiaan data, serta hak untuk menarik diri kapan saja tanpa konsekuensi akademik.

Langkah keempat adalah pelaksanaan pengisian kuesioner. Pengisian kuesioner dilakukan secara tatap muka di ruang kelas, dipandu langsung oleh peneliti dan dibantu oleh dua asisten penelitian untuk: Memberikan instruksi pengisian yang konsisten, Menjawab pertanyaan jika ada item yang tidak dipahami, Memastikan semua item terisi lengkap sehingga meminimalkan missing data, Setiap sesi pengisian memakan waktu rata-rata 20–25 menit. Proses selanjutnya yaitu langkah kelima adalah pemeriksaan kelengkapan data. Setelah kuesioner dikumpulkan, peneliti melakukan pemeriksaan langsung untuk mendeteksi adanya item yang kosong atau jawaban tidak konsisten. Jika ditemukan kekosongan, responden diberi kesempatan segera melengkapi. Langkah terakhir adalah penyimpanan dan pengkodean data. Semua kuesioner yang telah lengkap diberi kode identifikasi anonim untuk menjaga kerahasiaan identitas partisipan. Data kemudian dimasukkan ke dalam file Excel dengan pengamanan password sebelum diolah lebih lanjut di SPSS.

Instrumen Penelitian

1. Multidimensional Sense of Humor Scale (MSHS) (Thorson & Powell, 1993)

Pengembang: Thorson & Powell tahun 1993 untuk versi validasi utuh, meskipun skala awalnya dikenalkan dalam artikel tahun 1991. Jumlah item 24 pernyataan. Tipe skala adalah Likert 5 poin (1 = Sangat Tidak Setuju sampai dengan 5 = Sangat Setuju). Tujuannya mengukur sense of humor individu secara multidimensional, bukan hanya apakah seseorang "sering tertawa". MSHS mengukur empat dimensi utama sense of humor: 1) Humor Production & Creativity: Kemampuan individu menciptakan humor (misalnya membuat lelucon, bercerita lucu). 2) Humor Appreciation: Kemampuan menikmati atau

menanggapi humor yang dibuat orang lain. 3) Coping Through Humor: Kecenderungan menggunakan humor untuk mengatasi tekanan, stres, atau situasi sulit. 4) Attitudes Toward Humor: Sikap umum terhadap humor, seperti sejauh mana humor dianggap penting dalam hidup. Populasi awal adalah mahasiswa di Amerika, namun sudah diuji lintas budaya termasuk Indonesia dalam studi-studi berikutnya.

Adapun cara penggunaan dan penskoran sebagai berikut:

1) Responden diminta memberi skor pada setiap item dari 1 (Sangat Tidak Setuju) hingga 5 (Sangat Setuju). 2) Skor seluruh item dijumlahkan untuk mendapatkan skor total sense of humor. 3) Skor total berkisar antara 24 hingga 120. 4) Tidak ada nilai cut-off pada standar internasional; peneliti sering menggunakan median split pada data sampel untuk memisahkan kategori “rendah” vs “tinggi” sense of humor, sesuai distribusi data lokal.

Selanjutnya cara membaca interpretasi adalah sebagai berikut:

1) Semakin tinggi skor total MSHS, semakin tinggi tingkat sense of humor individu, yang menunjukkan kecenderungan positif dalam menciptakan, menikmati, dan memanfaatkan humor, termasuk dalam mengatasi stres. 2) Dalam penelitian ini, nilai median digunakan sebagai batas pemisah, yaitu : responden dengan skor di atas median dikategorikan sebagai high sense of humor, sedangkan yang di bawah median sebagai low sense of humor.

Peneliti melakukan uji coba skala versi Indonesia pada 30 mahasiswa dan menunjukkan rentang validitas 0.303-0.708 dan reliabilitas sangat bagus (Cronbach's $\alpha = 0.924$) (Periantolo, 2016). Terdapat satu aitem gugur dari 24 aitem yang tersedia yaitu aitem nomor 23. Total aitem yang digunakan untuk penelitian berjumlah 23 butir.

2. Perceived Stress Scale (PSS) – Versi Adaptasi

Pengembang asli alat ukur ini adalah Cohen et al. (1983). Jumlah item: Umumnya 10 item (ada versi 14 item). Penelitian ini menggunakan versi adaptasi Indonesia berbasis validasi Putri (2022) dengan 10 item. Tipe skala: Likert 5 poin (0 = Tidak Pernah, 4 = Sangat Sering). Tujuan: Mengukur sejauh mana situasi dalam hidup seseorang selama sebulan terakhir dirasakan sebagai penuh tekanan.

Parameter (dimensi) yang diukur tidak dibagi per subskala, namun secara keseluruhan menilai persepsi stres, yaitu seberapa sering individu merasa kewalahan, tidak dapat mengendalikan hal-hal penting dalam hidupnya, atau merasa gugup.

Cara penggunaan dan penskoran

Responden diminta menjawab seberapa sering mereka mengalami perasaan tertentu selama sebulan terakhir. Sebagian item positif (misalnya tentang perasaan yakin dapat menangani masalah) di-*reverse score* (dibalik). Total skor diperoleh dengan menjumlahkan semua item. Skor total berkisar antara 0 hingga 40.

Cara membaca interpretasi

Skor rendah (0–13): menunjukkan tingkat stres rendah. Skor sedang (14–26): menunjukkan tingkat stres sedang. Skor tinggi (27–40): menunjukkan tingkat stres tinggi. Pada penelitian ini data dikategorikan menjadi tinggi vs rendah dengan cut-off berdasarkan distribusi sampel (misalnya median atau nilai standar PSS yang sering digunakan, seperti 27).

Peneliti melakukan uji coba alat ukur skala versi Indonesia 30 mahasiswa dan menunjukkan rentang validitas 0.305-0.432 dan reliabilitas sangat bagus (Cronbach's $\alpha = 0,961$) (Periantolo, 2016). Tidak terdapat aitem gugur. Total aitem yang digunakan untuk penelitian berjumlah 10 butir.

Prosedur Penelitian

Sebelum melakukan uji coba alat ukur, peneliti telah mendaftarkan proposal penelitian kepada Dewan Etik penelitian dan sudah memperoleh persetujuan etik dari komisi etik Konsorsium Psikologi Ilmiah Nusantara (KPIN), (Nomor persetujuan: 083/2025 28 Maret 2025).

Pelaksanaan penelitian mulai dari membuat proposal sampai dengan uji coba alat ukur. Sebelum di distribusikan ke responden, peneliti melakukan uji coba kedua alat ukur penelitian terlebih dulu pada 30 mahasiswa. Hasil uji coba pada alat ukur MHSS menunjukkan rentang validitas 0.303-0.708 dan reliabilitas sangat bagus (Cronbach's $\alpha = 0.924$) (Periantolo, 2016). Terdapat satu aitem gugur dari 24 aitem yang tersedia yaitu aitem nomor 23. Total aitem yang digunakan untuk penelitian berjumlah 23 butir. Adapun alat ukur PSS menghasilkan rentang validitas 0.305-0.432 dan reliabilitas sangat bagus (Cronbach's $\alpha = 0,961$) (Periantolo, 2016). Tidak terdapat aitem gugur. Total aitem yang digunakan untuk penelitian berjumlah 10 butir.

Analisis Data

Tahap persiapan data

1. Pemeriksaan data (data cleaning). Langkah ini dimulai dari data yang terkumpul melalui kuesioner diperiksa kembali untuk memastikan tidak ada item yang kosong atau data ganda. Jika ditemukan inkonsistensi minor, dilakukan klarifikasi langsung kepada responden pada saat pengumpulan data; jika tidak mungkin, data tersebut dikeluarkan dari analisis. Setelah bersih, data dimasukkan ke lembar kerja Excel yang dilindungi sandi, kemudian diimpor ke software IBM SPSS Statistics versi 26 untuk proses analisis.

2. Pengkodean data (coding). Tahap ini meliputi: 1) Variabel kategori seperti jenis kelamin, kelompok usia, dan kategori lama studi dikodekan dalam angka (misalnya: 0 = laki-laki, 1 = perempuan). 2) Untuk instrumen MSHS dan PSS, semua item positif dan negatif disesuaikan dengan prosedur penskoran standar (item reverse-coded jika diperlukan) sebelum penjumlahan skor total

Analisis statistik:

1. Analisis deskriptif

Analisis ini dilakukan untuk menggambarkan karakteristik demografis partisipan seperti distribusi usia, jenis kelamin, lama studi, serta distribusi skor total sense of humor (MSHS) dan stres akademik (PSS). Statistik yang digunakan meliputi: 1) Rata-rata dan standar deviasi (SD) untuk data interval/rasio (misalnya skor MSHS dan PSS). 2) Frekuensi dan persentase (%) untuk data kategorik (misalnya jenis kelamin, kategori stres).

2. Analisis bivariat.

Tujuan dari analisis ini adalah mengidentifikasi variabel-variabel yang memiliki hubungan dengan stres akademik sebelum dimasukkan ke model multivariat. Uji yang digunakan: 1) Chi-square test untuk melihat hubungan antara variabel kategorik (misalnya jenis kelamin, lama studi) dengan tingkat stres. 2) Independent t-test untuk membandingkan rata-rata skor sense of humor antara kelompok stres rendah dan tinggi. Variabel dengan nilai $p < 0,25$ pada analisis bivariat dipertahankan untuk tahap analisis lanjutan.

3. Analisis multivariat

Pada uji analisis peneliti menggunakan model regresi logistik biner. Regresi ini digunakan untuk menguji apakah sense of humor dapat memprediksi kemungkinan mahasiswa mengalami stres akademik tinggi, setelah mengontrol variabel kovariat. Hasil regresi dilaporkan dalam bentuk: Koefisien regresi (B), Standard error (SE), Wald test & nilai p, Adjusted Odds Ratio (AOR) dengan 95% Confidence Interval (CI)

4. Uji kelayakan model

Peneliti menggunakan rumus Nagelkerke R^2 untuk mengukur sejauh mana model dapat menjelaskan variabilitas status stres akademik. Sedangkan uji Hosmer-Lemeshow digunakan untuk menguji goodness-of-fit model regresi logistik. Nilai $p > 0,05$ menunjukkan model cocok dengan data.

Interpretasi hasil

Interpretasi dari hasil analisis data terdiri dari dua bagian, meliputi: 1) Interpretasi odds ratio: AOR < 1, yang berarti variabel prediktor (misalnya sense of humor tinggi) menurunkan kemungkinan terjadi stres akademik tinggi. Contoh pada hasil: AOR sense of humor = 0,363 berarti mahasiswa dengan sense of humor tinggi memiliki peluang 63,7% lebih rendah mengalami stres akademik tinggi, atau sekitar 2,75 kali lebih kecil kemungkinannya dibanding mahasiswa dengan sense of humor rendah. 2) Interpretasi nilai Nagelkerke R^2 yang diperoleh (0,079) menunjukkan bahwa sense of humor dan lama studi secara bersama-sama menjelaskan sekitar 7,9% varians stres akademik, sehingga meski signifikan secara statistik, peran humor bersifat komplementer.

HASIL

Karakteristik Partisipan

Sebanyak 300 mahasiswa tingkat akhir berpartisipasi dalam penelitian ini. Rata-rata usia partisipan adalah 22 tahun ($SD = 1,1$), dengan mayoritas berjenis kelamin perempuan (77,9%). Sebagian besar partisipan (68%) melaporkan mengalami tingkat stres akademik sedang hingga tinggi berdasarkan skor PSS.

Tabel 1. Karakteristik Demografis Partisipan (N = 300)

Variabel	Kategori	n	%
Jenis Kelamin	Laki-laki	66	22,1
	Perempuan	234	77,9
Usia	<22 tahun	126	42,0
	≥22 tahun	174	58,0
Lama Studi	<4 tahun	94	31,3
	≥4 tahun	206	68,7
Kategori Sense of Humor (MSHS)	Rendah	150	50,0
	Tinggi	150	50,0
Kategori Stres Akademik (PSS)	Rendah / Sedang	96	32,0
	Tinggi	204	68,0

Selanjutnya adalah tabel 2 hasil dari penghitungan statistik deskriptif variabel alat ukur.

Tabel 2. Statistik Deskriptif Variabel Interval/Rasio

Variabel	Mean (SD)	Rentang Teoritis
Skor MSHS (Humor)	76,4 (8,5)	24 – 120
Skor PSS (Stres Akademik)	28,3 (4,7)	0 – 40
Usia (tahun)	22,1 (1,1)	20 – 25

Analisis Bivariat

Analisis bivariat dilakukan untuk mengidentifikasi variabel yang secara statistik berhubungan dengan stres akademik. Variabel dengan nilai $p < 0,25$ dimasukkan ke dalam model regresi logistik multivariat. Tabel 1 menyajikan hasil analisis bivariat.

Tabel 3. Analisis Bivariat sebagai Dasar Seleksi Variabel dalam Regresi Logistik

No.	Variabel	Kategori	Nilai p	Dimasukkan dalam Model
1	Jenis Kelamin	Laki-laki / Perempuan	0,327	Tidak
2	Usia	<22 tahun / ≥22 tahun	0,411	Tidak
3	Lama Studi	<4 tahun / ≥4 tahun	0,149	Ya
4	Skor Humor (MSHS)	Rendah / Tinggi	<0,001	Ya

Catatan: Variabel dengan nilai $p < 0,25$ dimasukkan ke dalam model regresi logistik multivariat. Skor humor dikategorikan berdasarkan nilai median.

Regresi Logistik Multivariat

Model regresi logistik biner digunakan untuk menguji apakah sense of humor secara signifikan memprediksi kemungkinan mengalami stres akademik tinggi, setelah mengontrol lama studi. Tabel 2 merangkum hasil analisis regresi.

Tabel 4. Model Regresi Logistik Multivariat terhadap Stres Akademik Tinggi

Prediktor	B	SE	Wald	Nilai p	Exp(B)	95% CI untuk Exp(B)
Humor (Tinggi)	-1,014	0,247	16,85	<0,001	0,363	0,224 – 0,589
Lama Studi	-0,481	0,218	4,87	0,027	0,618	0,401 – 0,953

- Nagelkerke $R^2 = 0,079$
- Uji Hosmer-Lemeshow = $p = 0,621$ (model sesuai)

Interpretasi: Mahasiswa dengan skor humor tinggi memiliki kemungkinan 2,75 kali lebih kecil untuk mengalami stres akademik tinggi ($1/0,363$). Lama studi juga menjadi prediktor signifikan terhadap stres, di mana mahasiswa yang telah menempuh studi ≥4 tahun cenderung melaporkan tingkat stres lebih rendah.

Analisis Efek Interaksi

Untuk mengeksplorasi kemungkinan pengaruh moderator, dilakukan analisis interaksi antara variabel demografis dan humor. Dari beberapa interaksi yang diuji (*Jenis KelaminHumor*, *UsiaHumor*, *Lama StudiHumor*), hanya interaksi ****Jenis KelaminHumor**** yang menunjukkan signifikansi statistik. Tabel 3 menyajikan hasil lengkap.

Tabel 5. Efek Interaksi terhadap Stres Akademik

Interaksi	B	SE	Nilai p	Keterangan
Jenis Kelamin * Humor	-0,746	0,348	0,032	Interaksi signifikan
Usia * Humor	-0,295	0,327	0,365	Tidak signifikan
Lama Studi * Humor	0,121	0,309	0,701	Tidak signifikan

Hasil ini mengindikasikan bahwa pengaruh protektif humor terhadap stres dapat bervariasi antara laki-laki dan perempuan. Namun demikian, temuan ini bersifat eksploratif dan memerlukan verifikasi lebih lanjut melalui desain penelitian longitudinal.

DISKUSI

Penelitian ini bertujuan untuk mengkaji sejauh mana sense of humor berperan sebagai faktor psikologis protektif terhadap stres akademik pada mahasiswa tingkat akhir program keperawatan dan psikologi. Temuan penelitian menunjukkan bahwa mahasiswa dengan tingkat humor yang tinggi secara signifikan lebih kecil kemungkinannya mengalami stres akademik yang tinggi. Setelah dikontrol dengan variabel lama studi, mahasiswa yang memiliki skor humor tinggi diketahui memiliki peluang sekitar 2,75 kali lebih kecil untuk mengalami stres akademik tinggi dibandingkan dengan mereka yang skor humornya rendah.

Humor sebagai Faktor Protektif

Hasil ini mendukung temuan penelitian sebelumnya yang menunjukkan bahwa humor dapat meningkatkan resiliensi dalam menghadapi tekanan dengan memungkinkan individu menafsirkan situasi sulit secara lebih positif (Martin, 2001; Hampes, 2010). Fungsi ini sejalan dengan teori penilaian kognitif stres dari Lazarus dan Folkman (1985), di mana mekanisme koping adaptif, termasuk humor, membantu individu dalam mengelola beban emosional yang muncul akibat tuntutan akademik yang tinggi.

Namun, penting untuk menafsirkan kekuatan hubungan ini secara proporsional. Meskipun hubungan antara humor dan stres menunjukkan signifikansi statistik ($p < 0,001$), model akhir regresi hanya mampu menjelaskan 7,9% variabilitas dalam tingkat stres akademik (Nagelkerke $R^2 = 0,079$). Ini menunjukkan bahwa meskipun humor merupakan variabel penting, ia hanya berkontribusi sebagian kecil dalam menjelaskan faktor-faktor penyebab stres. Dengan kata lain, humor bukanlah satu-satunya determinan, melainkan berfungsi sebagai komponen pelengkap dalam strategi peningkatan kesejahteraan mahasiswa secara keseluruhan.

Koreksi Interpretasi dan Konsistensi Model

Perlu diluruskan interpretasi yang keliru dalam versi awal naskah, di mana disampaikan bahwa mahasiswa dengan humor tinggi “3,6 kali lebih kecil kemungkinannya” mengalami stres, padahal nilai odds ratio aktual adalah 0,363. Interpretasi yang benar adalah bahwa mahasiswa dengan humor tinggi memiliki peluang 63,7% lebih rendah mengalami stres akademik, atau sekitar 2,75 kali lebih kecil kemungkinannya ($1 / 0,363$).

Selain itu, versi awal naskah secara inkonsisten menyatakan bahwa jenis kelamin dan usia dikontrol dalam model, padahal keduanya dikeluarkan dari model multivariat karena nilai p -nya $> 0,25$. Revisi ini mengklarifikasi bahwa hanya humor dan durasi studi yang dimasukkan sebagai prediktor dalam model akhir, memastikan konsistensi antara metode, hasil, dan interpretasi.

Efek Interaksi dengan Jenis Kelamin

Temuan bahwa terdapat interaksi signifikan antara jenis kelamin dan humor menandakan bahwa **efektivitas humor dalam menurunkan stres dapat berbeda antara laki-laki dan perempuan**. Hal ini sejalan dengan literatur yang menyatakan bahwa gaya humor dan penerimaan terhadap humor dipengaruhi oleh konstruksi sosial terkait peran gender (Greengross & Miller, 2011). Perempuan cenderung menggunakan humor yang bersifat afiliasi atau self-enhancing, sementara laki-laki lebih sering menggunakan humor agresif atau self-defeating. Meskipun demikian, hasil ini masih bersifat eksploratif dan perlu diteliti lebih lanjut dengan pendekatan kualitatif atau longitudinal.

Implikasi Praktis dalam Pendidikan Keperawatan

Meskipun kontribusi humor (nilai R^2) terhadap stres relatif kecil dalam model statistik, makna praktisnya tetap penting, terutama dalam konteks pendidikan kesehatan yang penuh tekanan. Humor merupakan strategi koping yang mudah diakses, murah, dan dapat dimasukkan ke dalam program dukungan kesehatan mental mahasiswa (Kim, 2014; Rashmi & Sunitha, 2023). Institusi pendidikan sebaiknya mempertimbangkan untuk mengintegrasikan strategi berbasis humor dalam berbagai program pendampingan psikososial mahasiswa, seperti: Penulisan jurnal reflektif humor, Lokakarya “coping with humor”, Integrasi humor edukatif dalam proses pembelajaran.

Hal terpenting bahwa setiap intervensi harus peka terhadap budaya. Dalam budaya akademis Indonesia, humor sering digunakan secara tidak langsung dan afiliasif, berbeda dengan gaya humor yang lebih konfrontatif yang diamati dalam konteks Barat. Program pengembangan fakultas dapat berperan dalam membantu para pendidik memodelkan humor konstruktif yang mengurangi ketegangan di kelas dan meningkatkan keterlibatan siswa. Intervensi berbiaya rendah dan dapat disesuaikan secara budaya seperti itu sangat menarik bagi lingkungan akademis dengan keterbatasan sumber daya di Asia. Selain itu, mereka mendorong partisipasi aktif dan dapat menumbuhkan rasa aman psikologis, yang sangat penting untuk lingkungan pembelajaran klinis (Suen, et al., 2016). Perbedaan ini memiliki implikasi yang signifikan terhadap desain intervensi kesehatan mental yang peka terhadap budaya. Strategi berbasis humor harus disesuaikan dengan norma budaya setempat, menekankan inklusivitas dan menghindari bentuk humor, seperti

sarkasme atau humor yang merugikan diri sendiri, yang dapat meningkatkan kecemasan, khususnya di kalangan populasi siswa yang rentan. (Wang, et al., 2018).

Keterbatasan dan Saran Penelitian Lanjutan

Beberapa keterbatasan perlu dicatat. Pertama, desain potong lintang tidak memungkinkan penarikan kesimpulan kausal. Penelitian longitudinal diperlukan untuk mengetahui apakah peningkatan kemampuan humor dapat menurunkan stres secara berkelanjutan. Kedua, pengukuran didasarkan pada data self-report, yang rentan terhadap bias sosial. Ketiga, partisipan hanya berasal dari satu institusi, sehingga generalisasi hasil menjadi terbatas.

Penelitian di masa depan disarankan untuk melibatkan sampel yang lebih beragam dari berbagai institusi dan wilayah, menyelidiki jenis humor secara lebih spesifik (afiliasi, agresif, self-enhancing, self-defeating), menguji efektivitas program intervensi humor terstruktur dengan desain eksperimental (misalnya, uji coba terkontrol acak).

KESIMPULAN

Penelitian ini memberikan bukti empiris bahwa tingkat sense of humor yang tinggi berhubungan secara signifikan dengan kemungkinan yang lebih rendah dalam mengalami stres akademik pada mahasiswa tingkat akhir di program studi keperawatan dan psikologi di Indonesia. Setelah dikontrol dengan variabel lama studi, mahasiswa dengan humor tinggi memiliki kemungkinan sekitar 2,75 kali lebih kecil untuk mengalami stres akademik yang tinggi. Temuan ini mendukung pemahaman humor sebagai faktor protektif psikologis dalam kerangka teori penilaian kognitif terhadap stres.

Namun demikian, nilai Nagelkerke R^2 sebesar 0,079 menunjukkan bahwa humor hanya menjelaskan sebagian kecil dari variasi tingkat stres. Artinya, humor bukanlah satu-satunya faktor penentu, melainkan salah satu elemen penting dalam strategi multidimensi untuk meningkatkan kesejahteraan psikologis mahasiswa.

Dari perspektif praktis, humor merupakan sumber daya koping yang mudah diakses, murah, dan relatif mudah diterapkan dalam program kesehatan mental mahasiswa. Institusi pendidikan, khususnya di bidang keperawatan dan ilmu kesehatan lainnya, disarankan untuk mengeksplorasi integrasi pendekatan berbasis humor dalam pembelajaran, konseling, maupun kegiatan pengembangan diri mahasiswa, dengan tetap memperhatikan sensitivitas budaya dan gaya komunikasi mahasiswa.

Penelitian di masa depan sebaiknya mengeksplorasi lebih jauh efek jangka panjang humor melalui desain eksperimental dan longitudinal, menyelidiki interaksinya dengan ciri-ciri psikologis lainnya (misalnya, resiliensi, optimisme), dan mengevaluasi intervensi humor terstruktur dalam lingkungan akademis.

Penelitian lanjutan disarankan untuk menggunakan desain longitudinal atau eksperimental guna menguji efek kausal dari intervensi humor, mengeksplorasi pengaruh jenis-jenis humor secara spesifik, serta mengintegrasikan variabel

psikologis lain seperti optimisme, efikasi diri, dan resiliensi dalam model yang lebih kompleks.

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Peninjau A:

Artikel ini unik karena menyajikan aspek humor dan stres di kalangan mahasiswa di Indonesia. Saya melihat karya ini berpotensi untuk dipublikasikan dengan beberapa perbaikan. Misalnya, banyak kalimat di latar belakang tidak memiliki referensi yang mendukung klaim tersebut. Mohon tambahkan lebih banyak sitasi ke bagian ini. Istilah COVID-19 tidak relevan dengan kondisi saat ini, maka mohon hapus istilah tersebut. Prevalensi stres di kalangan mahasiswa perlu ditambahkan di sini. Lalu mengapa Anda harus memilih "humor"? Jenis humor apa yang Anda teliti dalam karya ini?

Proses pengumpulan sampel harus dijelaskan di sini. Bagaimana Anda mendapatkan 300 partisipan? Bagaimana Anda menentukan jumlah tersebut? Mohon jelaskan berapa banyak parameter alat MSHS dan PSS? Jelaskan semua parameter dan cara menggunakan serta membaca hasil interpretasi? Jelaskan lebih lanjut tentang proses pengumpulan data selama penelitian, karena prosedurnya terlalu sederhana.

Karakteristik Partisipan, jelaskan dalam bentuk tabel, bukan dalam pendekatan naratif. Implikasi bagi praktik keperawatan bagi mahasiswa diperlukan.

Cover letter for the Editor

Indonesia, June 7 2025

Dear

Sumarno Adi Subrata, PhD

Editor-in-Chief, Journal of Holistic Nursing Science (JHNS)

I am pleased to submit my manuscript entitled “The Protective Role of Sense of Humour Against Academic Stress Among Indonesian Nursing Students: A Quantitative Multivariate Analysis” for consideration by the Journal of Holistic Nursing Science. In this study, I examine the relationship between Sense of Humour and perceived academic stress among undergraduate nursing students in Bekasi. Furthermore, the study highlights that Sense of Humour may be a beneficial coping resource for reducing academic stress in high-pressure educational environments.

I believe this manuscript aligns well with the scope and readership of JHNS, particularly given its focus on nursing care. I sincerely hope you will consider our manuscript for publication, as this work is crucial for my professional development. Thank you.

Yours sincerely,

Budi Sarasati

Author

Title Page

Title

The Protective Role of Sense of Humour Against Academic Stress Among Indonesian Nursing Students: A Quantitative Multivariate Analysis

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Conflict of Interest Statement

No conflict of interest to declare.

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Registration *(If available)*

The study approval was obtained from the Indonesian Consortium for Psychological Science (KPIN) (Approval number: 083/2025 on March 28, 2025).

Author's declaration

BS contributed to the study's conception and design, wrote the first draft of the manuscript, revised the final draft, and gave final approval of the version to be published.

ACWN contributed to data acquisition and data analysis

AI Statement

Nothing to declare

Availability of data and materials

The dataset generated and analyzed during the current study is available from the corresponding author upon reasonable request.

MANUSCRIPT

TITLE

The Protective Role of Sense of Humour Against Academic Stress Among Indonesian Nursing Students: A Quantitative Multivariate Analysis

ABSTRACT

Background:

Nursing students are often exposed to considerable academic pressure due to the dual demands of theoretical coursework and clinical responsibilities. This stress can negatively impact their psychological well-being and academic performance. Recent studies have indicated that Humour may function as a psychological buffer, enhancing emotional resilience and students' capacity to cope with academic challenges.

Objective:

This study aims to examine the relationship between Sense of Humour and perceived academic stress among undergraduate nursing students in West Java, and to evaluate whether Sense of humour is a protective psychological factor after adjusting for relevant demographic variables.

Methods:

A cross-sectional survey was conducted involving 300 final-year students enrolled in nursing programs. Instruments included the Multidimensional Sense of Humor Scale (MSHS) and a culturally adapted version of the Perceived Stress Scale (PSS). Bivariate analyses identified variables with $p < 0.25$, which were included in the multivariate logistic regression model. Adjusted odds ratios (AORs) were used to interpret associations.

Results:

Students with higher humour scores were significantly less likely to report high academic stress (AOR = 0.363, 95% CI: 0.224–0.589), indicating they were approximately 2.75 times less likely to experience elevated stress levels. Humour remained a significant predictor after adjusting for study duration. The final regression model explained 7.9% of the variance in stress status (Nagelkerke $R^2 = 0.079$).

Conclusion:

A sense of Humour may be a beneficial coping resource for reducing academic stress in high-pressure educational environments. Although the explained variance is modest, the findings support the inclusion of humour-promoting strategies in student

mental health programs. Further research is recommended to evaluate humour-based interventions longitudinally and across diverse academic settings.

Keywords:

academic stress, Humour, nursing education, resilience, emotion regulation

INTRODUCTION

Nursing education is regarded as one of the most rigorous academic fields due to its dual demands: mastering theoretical knowledge and demonstrating clinical competence. Students must understand complex scientific concepts while applying them in emotionally intensive clinical settings. Balancing these cognitive and emotional expectations places nursing students at a heightened risk of academic stress (Aslan & Akturk, 2018). In this context, academic stress refers to psychological strain resulting from high academic expectations, fear of failure, and overwhelming workloads (Zaki et al., 2022). A growing body of research indicates that nursing students frequently experience elevated stress levels, which may adversely affect their academic performance, psychological well-being, and overall quality of life (Younas, 2016).

Prolonged exposure to such stress may result in anxiety, burnout, depression, and diminished academic self-efficacy. Chronic academic stress has also impaired concentration, decision-making, memory, and key faculties essential to learning and clinical judgment (Mohamed et al., 2024). These concerns are particularly critical in nursing education, where poor mental health may jeopardize students' clinical performance and patient safety. Additional stressors, such as societal expectations, financial strain, and personal perfectionism, further intensify these pressures.

The incidence of academic stress has reached its highest levels since the pandemic. The transition from offline to online learning, limited access to clinical practice, and uncertainty regarding future careers have introduced additional layers of stress among students in health-related fields (Overbaugh, et al., 2022; Smith, et al., 2022). A study by Aulia and Panjaitan (2019) revealed that among final-year nursing students at a prominent university in Indonesia working on their undergraduate theses, 71.3% (n = 77) experienced moderate stress, while 14.8% (n = 16) reported high levels of stress. Research by Angelin et al. (2021) identified a significant association between stress levels and the occurrence of Generalized Anxiety Disorder (GAD) among final-year nursing students facing thesis completion.

A scientific study conducted by Ambarwati et al. (2019) reported that final-year students at a university in Magelang predominantly experienced moderate levels of stress, particularly among female students. Shehadeh et al. (2020) found that nursing students generally demonstrated moderate levels of self-efficacy, high academic stress, and low to moderate satisfaction with the curriculum and faculty performance. Similarly, a study by Shin (2016) on Korean nursing students concluded that academic stress significantly contributed to depressive symptoms, while academic resilience did not have a significant moderating effect.

More severe levels of stress have been associated with extreme behaviours. For instance, a study by Becker (2018) involving 1,704 college students from two different universities, reported that 4% of participants had attempted suicide, and 2.2% were likely to have engaged in suicidal behaviours. Academic stress is also frequently triggered by transitioning from classroom-based learning to direct clinical experiences, which can intensify stress during training (Suen et al., 2016). In addition, factors such as sleep quality, caffeine intake, and perceived stress have significantly influenced nursing students' overall mental health and well-being (Higbee, et al., 2022). Sarafino and Smith (2014) categorized stress symptoms into two main aspects: biological and psychological. Biological symptoms include headaches, sleep disturbances, digestive problems, muscle tension, irregular breathing and heartbeat, as well as feelings of nervousness, anxiety, restlessness, and changes in eating patterns. Psychological symptoms manifest in the form of cognitive disruptions, emotional symptoms (such as irritability, difficulty regulating emotions, sadness, and depression), and behavioural symptoms, often characterized by negative tendencies such as loss of interest and difficulty collaborating with others.

Thorson and Powell (1991) identified Humour as one of the coping strategies for managing stress. Humour enables individuals to deal with pressure or problems through amusement, which can elicit happiness. As a behavioural expression of Humour, Laughter promotes a sense of calmness and relaxation, reduces physical and emotional tension, and allows space for clearer thinking. Humour may be an effective alternative strategy for university students to anticipate, manage, and alleviate stress symptoms that could otherwise interfere with academic activities, particularly during the thesis writing process.

Stress and Resilience in Nursing Education

Stress has been associated with various adverse outcomes for nursing students, affecting their physical and psychological well-being and academic performance. Afzal (2016) reported that high levels of stress may contribute to negative perceptions of the nursing profession, exposure to incivility from healthcare staff, and experiences of dehumanizing behaviour, all of which may further exacerbate students' stress. Similarly, Sharma et al. (2022) found that stress can lead to fear of making clinical errors, criticism from peers and senior staff, inadequate access to equipment and knowledge, lower academic achievement, and difficulty maintaining a healthy balance between study and personal life.

Psychological stress is not merely a response to external pressures but a dynamic process shaped by individual appraisal and coping strategies. According to Lazarus and Folkman's (1985) transactional model, stress occurs when a person perceives that environmental demands exceed their available resources. Coping reflects the cognitive and behavioural efforts made to manage these demands. As such, strengthening students' coping mechanisms is essential for reducing the negative impact of academic stress.

One coping resource that has gained increasing attention is resilience, the ability to adapt positively in adversity. Resilient students are more likely to demonstrate academic engagement, psychological well-being, and satisfaction with their learning experience (Yoshioka & Kaneko, 2021). Crucially, resilience is not a fixed trait but a capacity that can be cultivated through personal and social development. Psychological factors such as optimism, emotion regulation, social support, and Sense of Humour have all contributed to resilience in educational contexts (Jang, 2024).

Humour as a Resilience-Enhancing Factor

In the framework of positive psychology, Humour is recognized as a multidimensional resource that fosters emotional resilience. As the cognitive and emotional capacity to perceive, enjoy, or express amusement, Humour supports stress regulation by allowing individuals to reinterpret difficult experiences more constructively (Martin & Lefcourt, 1983). Emerging empirical evidence suggests that individuals with a well-developed sense of humour exhibit better emotional regulation, perceive greater social support, and demonstrate higher resilience in academic and clinical environments (Bartzik et al., 2021; El-Sayed et al., 2024). In academic settings, humour has been shown to reduce anxiety, enhance classroom engagement, and even improve information retention when used appropriately (Fritz et al., 2017).

Neuropsychological studies suggest that laughter and positive effects activate the brain systems and are associated with stress reduction, including lower cortisol and higher levels of endorphins and serotonin (Martin, 2001). Thus, Humour is a social tool and a physiological coping mechanism.

Experimental studies have demonstrated the effectiveness of humour-based interventions, such as laughter therapy, comedy workshops, and reflective humour journaling, in alleviating psychological distress among students (Rashmi & Sunitha, 2023; Dogham et al., 2024). A systematic review by Wulandari and Wardani (2022) further confirmed that Humour contributes to mental health, particularly among individuals in demanding environments like clinical education.

Assessing Humour: Theoretical and Empirical Frameworks

Researchers have developed psychometric tools such as the Multidimensional Sense of Humor Scale (MSHS) by Thorson and Powell (1991) to measure Humour systematically. This instrument evaluates Humour across four dimensions: humour production, appreciation, coping through Humour, and attitude toward Humour. It has been widely validated across cultural settings and is frequently used in resilience research.

Numerous studies have confirmed the protective role of Humour against stress, particularly in high-pressure professions such as healthcare, education, and public safety (Greve et al., 2021; Richards & Kruger, 2017). Recent empirical studies conducted in diverse international contexts have reported a negative correlation between Humour and perceived stress (Canestrari et al., 2021). While the general benefits of Humour appear to be culturally universal, the way humour is expressed

and perceived varies significantly across social contexts. This emphasizes the importance of understanding cultural norms in designing humour-based interventions.

Research Gaps and Justification for the Study

Despite the growing interest in Humour as a coping mechanism, limited empirical research has examined its role among nursing students in Southeast Asia, especially in Indonesia. This represents a critical gap, given the unique challenges faced in the Indonesian academic landscape, which is shaped by hierarchical teaching styles, limited access to mental health resources, and strong socio-cultural expectations.

Moreover, although previous studies have found a correlation between Humour and stress, few have employed robust multivariate analyses to account for potential confounders such as age, Gender, or academic standing. As a result, the independent predictive role of Humour remains uncertain. This study addresses these gaps by employing a multivariate logistic regression approach to determine whether Sense of Humour independently predicts academic stress levels among undergraduate nursing students.

METHODS

Study Design and Participants

This study employed a quantitative design with a cross-sectional approach to examine the relationship between Sense of Humour and academic stress among final-year nursing students. The sample size determination was based on general guidelines for logistic regression analysis, which recommend a minimum of 10–20 participants per independent variable to avoid model overfitting (Peduzzi, et al., 1996). This study anticipated a maximum of five predictor variables; therefore, at least 100 participants (5×20) were required. However, to enhance statistical power and generalizability, the target sample size was increased to a minimum of 250 participants.

Participant Recruitment Procedure

Participants were recruited using purposive sampling, targeting final-year nursing students enrolled in parallel classes during their last two semesters. Before recruitment, the researchers collaborated with the academic program office to obtain a list of eligible classes that met the inclusion criteria. The study was announced through in-class presentations, faculty mediated communication, and student messaging groups (e.g., WhatsApp).

To be included in the study, participants had to meet specific inclusion criteria: they were required to be active students enrolled in a nursing program, currently in their final academic semesters (7th–8th), aged between 20 and 25 years, and willing to participate voluntarily by signing informed consent forms. Exclusion criteria included students on academic leave, those with a diagnosed history of severe psychiatric

disorders, or those who submitted incomplete questionnaires. Out of approximately 325 students invited to participate, 312 returned the questionnaire. After data screening, 12 questionnaires were excluded due to incompleteness, resulting in a final analytic sample of 300 participants.

Data Collection Procedure

Data collection in this study was carried out over 2 months with several structured stages: 1) Initial Coordination with the Faculty. The researchers first held meetings with the leadership of the nursing program to obtain formal permission to conduct the study on campus and to ensure that data collection would not interfere with scheduled academic activities. An agreement was reached regarding the appropriate timing for questionnaire distribution. 2) Participant Briefing and Information Dissemination. The study's objectives, benefits, procedures, and the rights and responsibilities of participants were explained verbally to students during several face-to-face class sessions by the researchers in collaboration with course instructors. Additionally, research information was distributed via the official student WhatsApp groups to ensure that students absent from class still received a full explanation of the study. 3) Informed Consent Process. Students who agreed to participate were asked to sign an informed consent form indicating their voluntary participation. The form included assurances regarding data confidentiality and participants' right to withdraw at any time without any academic consequences.

The fourth step is Questionnaire Administration. Questionnaires were administered in person during class sessions, facilitated directly by the principal researcher and supported by two trained research assistants. Their responsibilities included: Providing consistent instructions for completing the questionnaire, answering questions in case any items were unclear, and ensuring that all questionnaire items were completed to minimize missing data. Each session lasted approximately 20–25 minutes. The fifth step is Data Coding and Storage. All completed questionnaires were assigned anonymous identification codes to protect participant confidentiality. Of the approximately 325 students invited, 312 returned the questionnaire. Following data screening, 12 questionnaires were excluded due to incomplete responses, resulting in a final analytic sample of 300 participants. All data were entered and analyzed using IBM SPSS for Windows version 21.

Research Instrument

1. Multidimensional Sense of Humor Scale (MSHS) – Thorson & Powell (1993)

The Multidimensional Sense of Humor Scale (MSHS) was developed by Thorson and Powell in 1993, building upon the initial conceptual framework introduced in their 1991 publication. The validated scale consists of 24 items rated on a 5-point Likert scale, ranging from 1 (Strongly Disagree) to 5 (Strongly Agree). The purpose of the instrument is to assess an individual's Sense of Humour in a multidimensional manner, beyond the simplistic notion of how often a person laughs. The MSHS evaluates four primary dimensions of humor: Humor Production and Creativity, the ability to generate humor, such as making jokes or telling funny stories; Humor

Appreciation, the capacity to enjoy or respond positively to humor created by others; Coping Through Humor, the tendency to use humor as a coping mechanism in stressful or difficult situations; Attitudes Toward Humor, an individual's general disposition toward humor, including the perceived value of humor in life. The scale was validated initially among university students in the United States but has since been examined across diverse cultural contexts, including Indonesia.

Scoring and Interpretation Procedures: 1) Respondents are instructed to rate each item from 1 to 5 based on the extent of their agreement. Item scores are summed to obtain a total humour score, ranging from 24 to 120. There is no universal cutoff score; researchers often apply a median split based on the sample distribution to classify respondents into "low" and "high" Sense of humour groups. 2) In this study, the sample median score was used as the classification threshold: individuals scoring above the median were categorized as having a high sense of Humour, and those scoring below it as having a low sense of Humour.

A pilot study was conducted to validate the Indonesian version of the MSHS with a sample of 30 undergraduate students. The results indicated item-total validity coefficients ranging from 0.303 to 0.708, and excellent internal consistency reliability (Cronbach's $\alpha = 0.924$) (Periantalo, 2016). One item (Item 23) was excluded due to low psychometric performance, resulting in a final scale of 23 items for this study.

2. Perceived Stress Scale (PSS) – Adapted Version

The original Perceived Stress Scale (PSS) was developed by Cohen et al. (1983). The standard version contains 10 items, although a 14 item version also exists. This study utilized the Indonesian-adapted 10 item version validated by Putri (2022). The PSS employs a 5 point Likert scale, ranging from 0 (Never) to 4 (Very Often). It aims to assess how individuals perceive life situations as stressful over the past month. The scale does not include separate subscales; it provides a global measure of perceived stress, evaluating how often individuals felt overwhelmed, unable to control important aspects of their lives, or experienced nervousness and tension.

Scoring and Usage Procedures, respondents were asked to rate how frequently they experienced specific feelings during the past month. Several positively worded items (e.g., confidence in handling problems) are reverse-scored. The total score is calculated by summing all item responses, yielding a possible range from 0 to 40.

How to read the interpretation: Low scores (0–13) indicate low stress levels. A moderate score (14–26) indicates a moderate stress level. A high score (27–40) indicates a high stress level. This study categorized data as high vs. low with cutoffs based on the sample distribution (e.g., the median or a commonly used standard PSS score, such as 27). In this study, stress levels were further categorised as "high" versus "low" based on the sample distribution, either using the median split or standardised PSS cutoff values (e.g., a score of 27 or above as indicative of high stress).

A pilot test of the Indonesian version was conducted on 30 university students, resulting in item-total correlation coefficients ranging from 0.305 to 0.432, and

demonstrating excellent reliability with a Cronbach's alpha of 0.961 (Periantalo, 2016). No items were excluded, and the final instrument consisted of 10 items.

Research Procedure

Prior to the pilot testing of the measurement instruments, the researchers submitted the study protocol to the Research Ethics Committee. They obtained ethical clearance from the Ethics Commission of the *Konsorsium Psikologi Ilmiah Nusantara* (KPIN) under approval number: 083/2025, dated March 28, 2025.

Data Analysis

Data Preparation Stage

1. **Data Cleaning:** All returned questionnaires were carefully checked to ensure no missing items or duplicate entries. Clarification regarding minor inconsistencies was obtained directly from the respondent during data collection. If clarification was not possible, the data were excluded from the analysis. The cleaned data were then entered into a password-protected Excel spreadsheet and imported into IBM SPSS Statistics version 26 for analysis.
2. **Data Coding:** Categorical variables such as Gender, age group, and study duration were numerically coded (e.g., 0 = male, 1 = female). For both the MSHS and PSS instruments, item scoring followed standard procedures. Reverse scoring was applied where necessary before computing total scores.

Statistical Analysis

1. **Descriptive Analysis**
Descriptive statistics were used to summarise participants' demographic characteristics, including age distribution, Gender, study duration, and total scores of Sense of Humour (MSHS) and academic stress (PSS). Interval/ratio data (e.g., MSHS and PSS scores): presented as means and standard deviations (SD). Categorical data (e.g., Gender, stress categories): presented as frequencies and percentages (%).
2. **Bivariate Analysis**
This analysis aimed to identify variables associated with academic stress before inclusion in the multivariate model. Chi-square tests examined the association between categorical variables (e.g., gender, study duration) and stress levels. Independent t-tests were used to compare mean humour scores between students with high versus low academic stress. Variables with a p-value < 0.25 in the bivariate analysis were retained for subsequent multivariate testing.
3. **Multivariate Analysis**
Binary logistic regression was performed to assess whether Sense of Humour significantly predicted the likelihood of experiencing high academic stress

while adjusting for covariates. Results were reported in terms of: Regression coefficient (B), Standard error (SE), Wald test and p-value, Adjusted Odds Ratio (AOR) with 95% Confidence Intervals (CI).

4. Model Fit Assessment.

The Nagelkerke R^2 statistic was used to evaluate the explanatory power of the logistic regression model regarding academic stress status. The Hosmer–Lemeshow goodness-of-fit test was also employed to assess the model's adequacy. A p-value > 0.05 indicated an acceptable model fit.

Interpretation of Results

The interpretation of the data analysis results consists of two main components:

- 1) Interpretation of the Odds Ratio (AOR). An AOR less than 1 indicates that the predictor variable (e.g., high Sense of Humour) reduces the likelihood of experiencing high academic stress. For example, in this study, the AOR for Sense of Humour was 0.363, which implies that students with a high sense of Humour were 63.7% less likely to experience high academic stress. This corresponds to an approximately 2.75 times lower likelihood than students with a low sense of humour.
- 2) Interpretation of Nagelkerke R^2 . The Nagelkerke R^2 value (0.079) suggests that Sense of Humour and study duration explain approximately 7.9% of the variance in academic stress levels. Although this relationship is statistically significant, the contribution of Humour can be considered complementary rather than dominant in explaining academic stress among students.

RESULTS

Participant Characteristics

A total of 300 final-year undergraduate students participated in the study. The mean age of the participants was 22.1 years (SD = 1.1), with 78% identifying as female. The majority (68%) reported experiencing moderate to high levels of academic stress based on the PSS scores.

Tabel 1. Karakteristik Demografis Partisipan (N = 300)

Variabel	Kategori	n	%
Jenis Kelamin	Laki-laki	66	22,1
	Perempuan	234	77,9
Usia	<22 tahun	126	42,0
	≥22 tahun	174	58,0
Lama Studi	<4 tahun	94	31,3
	≥4 tahun	206	68,7
Kategori Sense of Humor (MSHS)	Rendah	150	50,0
	Tinggi	150	50,0
Kategori Stres Akademik (PSS)	Rendah / Sedang	96	32,0
	Tinggi	204	68,0

Bivariate Analysis

Bivariate analyses were conducted to identify variables significantly associated with academic stress, using a p-value threshold of <0.25 for model inclusion. Table 2 presents the results.

Table 2. Bivariate Analysis for Candidate Variables for Logistic Regression

No.	Variable	Category	p-value	Included in the Model
1	Gender	Male / Female	0.327	No
2	Age	<22 / ≥22	0.411	No
3	Study Duration	<4 years / ≥4 years	0.149	Yes
4	Humor Score (MSHS)	Low / High	<0.001	Yes

Note: Variables with $p < 0.25$ were included in the multivariate model. Humour score was dichotomized based on the median split.

Multivariate Logistic Regression

A binary logistic regression was conducted to assess whether Sense of Humour significantly predicted the likelihood of experiencing high academic stress, adjusting for study duration. Table 3 summarises the regression model.

Table 3. *Multivariate Logistic Regression Predicting High Academic Stress*

Predictor	B	SE	Wald	p-value	Exp(B)	95% CI for Exp(B)
Humor (High)	-1.014	0.247	16.85	<0.001	0.363	0.224 – 0.589
Study Duration	-0.481	0.218	4.87	0.027	0.618	0.401 – 0.953

- **Nagelkerke R^2** = 0.079
- **Hosmer-Lemeshow Test** = $p = 0.621$ (good fit)

Interpretation: Students with high humour scores were approximately 2.75 times less likely to experience high stress ($1/0.363$). Longer study duration also predicted lower stress levels. Students who have studied for ≥ 4 years tend to report lower stress levels.

Interaction Effect Analysis

Interaction effects were examined to explore potential moderating variables. Among the interactions tested (*GenderHumor*, *AgeHumor*, *StudyDurationHumor*), *only GenderHumor* showed statistical significance. Table 4 presents the detailed interaction terms.

Table 4. *Interaction Effects on Academic Stress*

Interaction Term	B	SE	p-value	Description
Gender * Humor	-0.746	0.348	0.032	Significant interaction
Age * Humor	-0.295	0.327	0.365	Not significant
Study Duration * Humour	0.121	0.309	0.701	Not significant

The significant interaction between Gender and Humour suggests that the protective effect of humour may differ slightly between male and female students. However, these findings are exploratory and require further verification through longitudinal research designs.

DISCUSSION

The primary objective of this study was to examine whether a student's Sense of Humour is significantly associated with their level of academic stress. The results confirmed a strong inverse relationship: students who reported higher humour scores were less likely to experience high levels of perceived academic stress. This supports the growing evidence that Humour is not simply a personality trait but a modifiable psychological resource contributing to emotional regulation and cognitive reframing, particularly in stressful academic environments (Bartzik et al., 2021).

Building on the core finding that Humour significantly reduces academic stress, this study offers a foundation for rethinking psychological support strategies in nursing education. The inverse relationship between Humour and stress reinforces the

concept of Humour as a cognitive-emotional buffer, enabling students to reinterpret stressful situations more constructively (Lefcourt, 2003; Martin & Lefcourt, 1983; Wellenzohn, et al., 2018). By reframing threatening academic demands through Humour, students may reduce perceived burden and recover motivation more rapidly.

Moreover, this study provides empirical evidence that Humour remains a statistically significant protective factor even after controlling for study duration and age. These findings support the hypothesis that Humour contributes independently to stress regulation, an insight crucial in refining student mental health frameworks.

Humor as a Stress Buffer

Our findings are consistent with previous literature, including Fritz et al. (2017) who demonstrated that individuals using Humour as a coping mechanism experienced fewer adverse effects from stressful life events. This stress-buffering function is particularly relevant in the context of nursing education, an environment known for its high demands and frequent exposure to emotionally charged situations. Humour allows students to approach challenges with psychological distance, which reduces the threat perception of academic tasks and increases emotional resilience. In Lazarus and Folkman's (1985) cognitive theory of stress, the interpretation or "appraisal" of stressors plays a central role in emotional response. When employed constructively, Humour alters this appraisal by reframing a harmful or threatening situation into something more manageable or even absurd, thereby reducing emotional reactivity. This aligns with our finding that students with a higher sense of Humour reported significantly lower academic stress, despite having similar academic loads and demographic characteristics.

Humour as a Protective Factor

The result supports previous research suggesting that Humour may promote resilience in the face of stress by enabling individuals to reinterpret challenges through a more positive or absurd lens (Martin, 2001; Hampes, 2010). This cognitive reframing aligns with Lazarus and Folkman's (1985) theory of stress appraisal, wherein personal resources, such as adaptive coping styles, moderate the emotional impact of external demands. However, it is important to interpret the strength of this finding cautiously. While the association between Humour and stress is statistically significant ($p < 0.001$), the final multivariate model explained only 7.9% of the variance in perceived stress levels (Nagelkerke $R^2 = 0.079$). Although humour contributes to stress mitigation, it is likely only one of many interacting psychological, academic, and environmental factors influencing stress outcomes. Therefore, while Humour may be protective, it is not determinative, and its contribution should not be overstated.

Clarifying Misinterpretations and Model Accuracy

It is worth addressing a common misinterpretation in logistic regression reporting. The abstract in the original version erroneously stated that students with high Humour were "3.6 times less likely" to experience stress, which was inconsistent with the actual Exp(B) value of 0.363. In logistic regression, the proper interpretation

is that an $\text{Exp}(B)$ of 0.363 indicates a 63.7% reduction in odds of high stress or a 2.75 times lower likelihood ($1 / 0.363$) of experiencing stress. Furthermore, earlier drafts of the paper inconsistently claimed that Gender and age were controlled in the regression model, even though they were excluded based on bivariate p-values exceeding 0.25. This revision clarifies that only humour and study duration were predictors in the final model, ensuring consistency between methods, results, and interpretation.

Gender Interaction Effect

The significant interaction between Gender and Humour observed in the interaction analysis suggests that the protective function of humour may operate differently across male and female students. This aligns with literature suggesting that humour expression and reception are shaped by gender norms and expectations (Greengross & Miller, 2011). For example, women may rely more on affiliative or self-enhancing humour, while men may use more aggressive or self-defeating forms. However, given the limited variance explained by the model and the study's cross-sectional nature, these findings should be considered exploratory.

Cultural Dimensions of Humour in Coping

Cultural expectations and communication norms may also influence Humour's role in stress management. In collectivist societies such as Indonesia, where overt expression of negative emotions is often discouraged, humour may serve as a socially acceptable outlet for emotional release. Moreover, humorous interactions can foster a sense of group cohesion, further buffering stress's impact. In contrast to Western settings, where individual coping strategies dominate, humour in collectivist cultures may be more relational, serving as a bridge between individuals rather than an individualistic tool (Lu, 2023).

Interestingly, the interaction analysis in our study revealed gender differences in how Humour was related to stress. While both male and female students benefited from high humour scores, the strength of the relationship varied. This may be attributed to gender-based socialization patterns in emotional expression and coping behaviour. Further qualitative inquiry could provide deeper insight into how Humour is experienced and used differently across gender groups in academic settings.

Cultural context plays a significant role in shaping how Humour is expressed and interpreted. In collectivist societies such as Indonesia, Humour is often employed in indirect, affiliative forms that preserve group harmony and avoid confrontation. Affiliative Humour (e.g., shared jokes, light teasing) has been found to promote interpersonal bonding and reduce anxiety more effectively in collectivist cultures than in individualist ones, where self-enhancing Humour may dominate. This distinction has important implications for culturally sensitive mental health programming. Humour interventions must be tailored to local norms, favouring inclusivity and avoiding sarcasm or self-defeating humour, which may exacerbate anxiety in vulnerable students. A recent meta-analysis demonstrates that affiliative and self-enhancing humour reliably promote subjective well-being across diverse cultural contexts, while aggressive and self-defeating humour often undermines psychological health (Jiang, et al., 2020). In collectivist cultures—such as in

Confucian-influenced societies—humour plays a relational role, fostering social harmony rather than serving as an intrapersonal coping strategy (Kim & Plester, 2019).

Neuroscientific Insights

From a biopsychological standpoint, Humour activates the brain's reward circuitry, including the ventromedial prefrontal cortex and limbic system (Kennison, 2020; Martin, 2001). These regions are responsible for processing emotion, attention, and social cognition, which are often impacted by chronic stress. Humour-induced laughter has been shown to reduce cortisol levels and increase immune response (Farkas, et al., 2021). These findings give biological credibility to our study's psychological effects and highlight Humour's integrative nature as a wellness tool.

Implications for Practice

Despite the modest R^2 value, the results hold practical significance. Humour is a low-cost, low-barrier coping resource that can be incorporated into wellness programs and stress-reduction interventions. Academic institutions, particularly in high-pressure fields such as nursing and health sciences, should consider integrating humour-based strategies, such as peer-led humour groups, reflective humour journaling, or incorporating appropriate HumourHumour into lectures, as part of broader student support efforts (K. H. Kim, 2014; Rashmi & Sunitha, 2023).

Importantly, any intervention should be culturally sensitive. Humour is often used indirectly and affiliatively in Indonesian academic culture, unlike more confrontational humour styles observed in Western contexts. Faculty development programs can play a role in helping educators model constructive humour that reduces classroom tension and promotes student engagement. Such low-cost, culturally adaptable interventions are desirable for Asian resource-constrained academic settings. Moreover, they encourage active participation and can foster a sense of psychological safety, which is crucial for clinical learning environments (Suen et al., 2016). This distinction has significant implications for designing culturally sensitive mental health interventions. Humour-based strategies should be adapted to align with local cultural norms, emphasizing inclusivity and avoiding forms of Humour, such as sarcasm or self-defeating Humour, that may increase anxiety, particularly among vulnerable student populations.(Wang, et al., 2018).

Limitations and Future Research

Several limitations should be acknowledged. First, the study's cross-sectional design precludes causal inference. Longitudinal research is needed to determine whether increasing Humour over time reduces academic stress. Second, all measures relied on self-reported data, which may be subject to social desirability bias. Third, although the instruments were validated, the study was limited to a single academic institution, which may affect the generalizability of the findings. Future research

should consider: Expanding sample diversity across universities and regions, exploring different humour styles (affiliative, self-enhancing, aggressive, self-defeating), and testing structured humour interventions experimentally (e.g., randomized controlled trials).

CONCLUSION

This study provides empirical evidence that a higher sense of humour is significantly associated with a lower likelihood of experiencing academic stress among final-year nursing and psychology students in Indonesia. After adjusting for study duration, students with higher humour levels were approximately 2.75 times less likely to report high perceived stress. These findings support the conceptualization of humour as a protective psychological factor, consistent with cognitive stress appraisal theory.

However, the model's relatively small variance (Nagelkerke $R^2 = 0.079$) suggests that humour, while statistically significant, represents just one of many factors influencing academic stress. Therefore, humour should be understood as a complementary, not primary, component in broader strategies to enhance student well-being.

From a practical perspective, the accessibility and low cost of humour-based approaches make them attractive for inclusion in academic mental health promotion. Educators and institutions are encouraged to explore ways of embedding constructive humour into curriculum delivery, peer support initiatives, and stress management programs, while remaining sensitive to cultural norms and individual differences.

Future studies should further explore humor's long-term effects through experimental and longitudinal designs, investigate its interaction with other psychological traits (e.g., resilience, optimism), and evaluate structured humor interventions within academic environments.

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